December 3, 2019

Alan Sundquist CDW Consultants, Inc. 6 Huron Drive Natick, MA 01760

Project Location: Beaver St., Waltham, MA

Client Job Number: Project Number: 1552

Laboratory Work Order Number: 19K1404

Michelle Koch

Enclosed are results of analyses for samples received by the laboratory on November 22, 2019. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Michelle M. Koch Project Manager

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CDW Consultants, Inc. 6 Huron Drive Natick, MA 01760

ATTN: Alan Sundquist

PURCHASE ORDER NUMBER:

REPORT DATE: 12/3/2019

PROJECT NUMBER:

ANALYTICAL SUMMARY

WORK ORDER NUMBER:

1552

19K1404

The results of analyses performed on the following samples submitted to the CON-TEST Analytical Laboratory are found in this report.

PROJECT LOCATION:

Beaver St., Waltham, MA

FIELD SAMPLE #	LAB ID:	MATRIX	SAMPLE DESCRIPTION	TEST	SUB LAB
HB-16	19K1404-01	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-17	19K1404-02	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-19	19K1404-03	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	:
HB-20	19K1404-04	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-22	19K1404-05	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-23	19K1404-06	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-24	19K1404-07	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-25	19K1404-08	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-26	19K1404-09	Soil		SM 2540G	
				SW-846 6010D	
				SW-846 7471B	
				SW-846 8270D-E	
HB-27	19K1404-10	Soil		SM 2540G	
110-21	17121707-10	5011		SW-846 6010D	
				SW-846 7471B	



CASE NARRATIVE SUMMARY

All reported results are within defined laboratory quality control objectives unless listed below or otherwise qualified in this report.



SW-846 6010D

Qualifications:

MS-07

Matrix spike recovery is outside of control limits. Analysis is in control based on laboratory fortified blank recovery. Possibility of sample matrix effects that lead to low bias for reported result or non-homogeneous sample aliquot cannot be eliminated.

Analyte & Samples(s) Qualified:

19K1404-01[HB-16], B247118-MS1

SW-846 7471B

Qualifications:

R-05

Laboratory fortified blank duplicate RPD is outside of control limits. Reduced precision is anticipated for any reported value for this

compound.
Analyte & Samples(s) Qualified:

B247114-BSD1

SW-846 8270D-E

Qualifications:

L-04

Laboratory fortified blank/laboratory control sample recovery and duplicate recovery are outside of control limits. Reported value for this compound is likely to be biased on the low side. Analyte & Samples(s) Qualified:

19K1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-08[HB-25], 19K1404-09[HB-26], 19K1404-10[HB-27], B246869-BLK1, B246869-BS1, B246869-BSD1

V-04

Initial calibration did not meet method specifications. Compound was calibrated using a response factor where %RSD is outside of method specified criteria. Reported result is estimated. ...alyte & Samples(s) Qualified:

2,4-Dinitrophenol

19K1404-09[HB-26], 19K1404-10[HB-27]

19K1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-08[HB-25], B246869-BLK1, B246869-BS1, B246869-BSD1

V-05

Continuing calibration verification (CCV) did not meet method specifications and was biased on the low side for this compound.

Analyte & Samples(s) Qualified:

19K1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-08[HB-25], 19K1404-09[HB-26], 19K1404-10[HB-27], B246869-BLK1, B246869-BS1, B246869-BSD1

Hexachlorocyclopentadiene

19K1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-08[HB-25], B246869-BLK1, B246869-BS1, B246869-BSD1

Pentachlorophenol

19K1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-07[

19K1404-08[HB-25], B246869-BLK1, B246869-BS1, B246869-BSD1

V-20

Continuing calibration verification (CCV) did not meet method specifications and was biased on the high side. Data validation is not affected since sample result was "not detected" for this compound. Analyte & Samples(s) Qualified:

2.4-Dinitrophenol

19K1404-09[HB-26], 19K1404-10[HB-27]

V-34

Initial calibration verification (ICV) did not meet method specifications and was biased on the low side for this compound. Reported result is estimated

Analyte & Samples(s) Qualified:

hloroaniline

4.1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-08[HB-25], B246869-BLK1, B246869-BS1, B246869-BSD1



V-35

Initial calibration verification (ICV) did not meet method specifications and was biased on the high side for this compound. Reported result is

estimated. Analyte & Samples(s) Qualified:

2-Nitroaniline

19K1404-09[HB-26], 19K1404-10[HB-27]

Benzidin

19K1404-01[HB-16], 19K1404-02[HB-17], 19K1404-03[HB-19], 19K1404-04[HB-20], 19K1404-05[HB-22], 19K1404-06[HB-23], 19K1404-07[HB-24], 19K1404-08[HB-25], B246869-BLK1, B246869-BSD1

The results of analyses reported only relate to samples submitted to the Con-Test Analytical Laboratory for testing.

l certify that the analyses listed above, unless specifically listed as subcontracted, if any, were performed under my direction according to the approved methodologies listed in this document, and that based upon my inquiry of those individuals immediately responsible for obtaining the information, the material contained in this report is, to the best of my knowledge and belief, accurate and complete.

Lisa A. Worthington
Technical Representative

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Work Order: 19K1404



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Beaver St., Waltham, MA

Sample Description:

Pate Received: 11/22/2019
Field Sample #: HB-16

Sampled: 11/20/2019 14:00

Sample ID: 19K1404-01
Sample Matrix: Soil

Semivolatile Organic Compounds by GC/MS

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Acenaphthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Acenaphthylene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Acetophenone	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Aniline	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Anthracene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzidine	ND	1.2	mg/Kg dry	1	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzo(a)anthracene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzo(a)pyrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzo(b)fluoranthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzo(g,h,i)perylene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzo(k)fluoranthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Benzoic Acid	ND	1.8	mg/Kg dry	i	L-04	SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Bis(2-chloroethoxy)methane	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Bis(2-chloroethyl)ether	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Bis(2-chloroisopropyl)ether	ND	0.61	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Bis(2-Ethylhexyl)phthalate	ND	0.61	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
4-Bromophenylphenylether	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Butylbenzylphthalate	ND	0.61	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Carbazole	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
4-Chloroaniline	ND	1.2	mg/Kg dry	l	V-34	SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
4-Chloro-3-methylphenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
2-Chloronaphthalene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
2-Chlorophenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
4-Chlorophenylphenylether	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Chrysene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Dibenz(a,h)anthracene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Dibenzofuran	ND	0.61	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Di-n-butylphthalate	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
1,2-Dichlorobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
1,3-Dichlorobenzene	ND	0.61	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
,4-Dichlorobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
3,3-Dichlorobenzidine	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
2,4-Dichlorophenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Diethylphthalate	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
2,4-Dimethylphenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Dimethylphthalate	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
,6-Dinitro-2-methylphenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
,4-Dinitrophenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
,4-Dinitrotoluene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
,6-Dinitrotoluene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
Di-n-octylphthalate	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
,2-Diphenylhydrazine/Azobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
luoranthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB
	IAD	U.JU	me/re uiv	1		J 77-070 02/UD-E	11144/17	11/4/1/17 44.1/	KLD



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

ate Received: 11/22/2019
Field Sample #: HB-16

Sampled: 11/20/2019 14:00

Sample ID: 19K1404-01
Sample Matrix: Soil

Semivolatile Organic Compounds by GC/MS											
							Date	Date/Time			
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst		
Hexachlorobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Hexachlorobutadiene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Hexachlorocyclopentadiene	ND	0.61	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Hexachloroethane	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Indeno(1,2,3-cd)pyrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Isophorone	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
1-Methylnaphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
2-Methylnaphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
2-Methylphenol	ND	0.61	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
3/4-Methylphenol	ND	0.61	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Naphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
2-Nitroaniline	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
3-Nitroaniline	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
4-Nitroaniline	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Nitrobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
2-Nitrophenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
4-Nitrophenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
4-Nitrosodimethylamine	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
N-Nitrosodiphenylamine/Diphenylamine	ND	0.61	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
N-Nitrosodi-n-propylamine	ND	0.61	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Pentachloronitrobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Pentachlorophenol	ND	0.61	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Phenanthrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Phenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Рутепе	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Pyridine	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
1,2,4,5-Tetrachlorobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
1,2,4-Trichlorobenzene	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
2,4,5-Trichlorophenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
2,4,6-Trichlorophenol	ND	0.61	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:17	KLB		
Surrogates		% Recovery	Recovery Limit	s	Flag/Qual						
2-Fluorophenol		68.6	30-130					11/27/19 22:17			
Phenol-d6		68.9	30-130					11/27/19 22:17			
Nitrobenzene-d5		66.4	30-130					11/27/19 22:17			
2-Fluorobiphenyl		69.6	30-130					11/27/19 22:17			
2,4,6-Tribromophenol		73.3	30-130					11/27/19 22:17			
p-Terphenyl-d14		92.5	30-130					11/27/19 22:17			



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

ate Received: 11/22/2019 Field Sample #: HB-16

Sampled: 11/20/2019 14:00

Sample ID: 19K1404-01 Sample Matrix: Soil

Metals Analyses (Total)										
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst	
Antimony	ND	3.0	mg/Kg dry	1	MS-07	SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Arsenic	8.1	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	МЛН	
Barium	64	3.0	mg/Kg dry	l		SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Beryllium	0.49	0.30	mg/Kg dry	I		SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Cadmium	ND	0.30	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	MJH	
Chromium	14	0.60	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	MJH	
Lead	87	0.90	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Mercury	0.11	0.044	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 9:47	CJV	
Nickel	9.8	0.60	mg/Kg dry	i		SW-846 6010D	11/26/19	11/27/19 3:20	МЛН	
Selenium	ND	6.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Silver	ND	0.60	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Thallium	ND	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	MJH	
Vanadium	37	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:20	МЈН	
Zinc	70	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 16:41	TBC	



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Pate Received: 11/22/2019
Field Sample #: HB-16

Sampled: 11/20/2019 14:00

Sample ID: 19K1404-01 Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		55.8		% Wı	1		SM 2540G	11/25/19	11/26/19 10:38	adb



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-17

Sampled: 11/20/2019 15:00

Sample ID: 19K1404-02 Sample Matrix: Soil

			Semivolatile Organic C	ompounds b			15.		
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Acenaphthene	ND	0,30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Acenaphthylene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Acetophenone	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Aniline	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Anthracene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzidine	ND	1.1	mg/Kg dry	1	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzo(a)anthracene	ND	0.30	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzo(a)pyrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzo(b)fluoranthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzo(g,h,i)perylene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzo(k)fluoranthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Benzoic Acid	ND	1.7	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Bis(2-chlorocthoxy)methane	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Bis(2-chloroethyl)ether	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Bis(2-chloroisopropyl)ether	ND	0.59	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Bis(2-Ethylhexyl)phthalate	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
4-Bromophenylphenylether	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Butylbenzylphthalate	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Carbazole	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
4-Chloroaniline	ND	1.1	mg/Kg dry	l	V-34	SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
4-Chloro-3-methylphenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2-Chloronaphthalene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2-Chiorophenol	ND	0.59	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
4-Chlorophenylphenylether	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Chrysene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Dibenz(a,h)anthracene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Dibenzofuran	ND	0.59	mg/Kg dry	ì		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Di-n-butylphthalate	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
1,2-Dichlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
1,3-Dichlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
1,4-Dichlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
3,3-Dichlorobenzidine	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2,4-Dichlorophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Diethylphthalate	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2,4-Dimethylphenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Dimethylphthalate	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
4,6-Dinitro-2-methylphenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2,4-Dinitrophenol	ND	1.1	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2,4-Dinitrotoluene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
2,6-Dinitrotoluene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Di-n-octylphthalate	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
1,2-Diphenylhydrazine/Azobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Fluoranthene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB
Fluorene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB

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Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-17

Sampled: 11/20/2019 15:00

Sample ID: 19K1404-02 Sample Matrix: Soil

	Semivolatile Organic Compounds by GC/MS											
	D 1	7.7	***	D 11 - 11 - 1	TI101	M 15 - 1	Date	Date/Time				
Analyte Hexachlorobenzene	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst			
Hexachlorobutadiene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
	ND	0.59	mg/Kg dry	1	1/05	SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Hexachlorocyclopentadiene	ND	0.59	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Hexachloroethane	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Indeno(1,2,3-cd)pyrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Isophorone	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
1-Methylnaphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
2-Methylnaphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
2-Methylphenol	ND	0.59	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
3/4-Methylphenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Naphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
2-Nitroaniline	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
3-Nitroaniline	ND	0.59	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
4-Nitroaniline	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Nitrobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
2-Nitrophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
4-Nitrophenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
N-Nitrosodimethylamine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
N-Nitrosodiphenylamine/Diphenylamine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
N-Nitrosodi-n-propylamine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Pentachloronitrobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Pentachlorophenol	ND	0.59	mg/Kg dry	I	V-05	SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Phenanthrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Phenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Pyrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Pyridine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
1,2,4,5-Tetrachlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
1,2,4-Trichlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
2,4,5-Trichlorophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
2,4,6-Trichlorophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 22:40	KLB			
Surrogates		% Recovery	Recovery Limit	S	Flag/Qual							
2-Fluorophenol		69.6	30-130					11/27/19 22:40				
Phenol-d6		69.9	30-130					11/27/19 22:40				
Nitrobenzene-d5		66.8	30-130					11/27/19 22:40				
2-Fluorobiphenyl		67.8	30-130					11/27/19 22:40				
2,4,6-Tribromophenol		74.3 87.2	30-130 30-130					11/27/19 22:40 11/27/19 22:40				
p-Terphenyl-d14		01.2	30-130					11/2/11/2 44.40				



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-17

Sampled: 11/20/2019 15:00

Sample ID: 19K1404-02
Sample Matrix: Soil

•									
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony	ND	2.9	mg/Kg dry	l		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Arsenic	6.8	2.9	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Barium	56	2.9	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Beryllium	0.45	0.29	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Cadmium	0.29	0.29	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Chromium	13	0.58	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Lead	93	0.87	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Mercury	0.12	0.046	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 9:48	CJA
Nickel	9.4	0.58	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Scienium	ND	5.8	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Silver	ND	0.58	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Thallium	ND	2.9	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Vanadium	37	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:26	МЈН
Zinc	60	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 16:46	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Pate Received: 11/22/2019
Field Sample #: HB-17

Sampled: 11/20/2019 15:00

Sample ID: 19K1404-02
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		56.6		% Wt	1		SM 2540G	11/25/19	11/26/19 10:38	adb

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39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-19

Sampled: 11/21/2019 08:30

Sample ID: 19K1404-03 Sample Matrix: Soil

			Semivolatile Organic C	ompounds b	y GC/MS				
	ga. 1.	D.F.	** **	Dil. d	m/01	Made	Date	Date/Time	4
Analyte Acenaphthene	Results ND	RL 0.25	Units	Dilution 1	Flag/Qual	Method SW-846 8270D-E	Prepared 11/24/19	Analyzed 11/27/19 23:03	Analys KLB
Acenaphthylene	ND ND	0.25	mg/Kg dry mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Acetophenone	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Aniline	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Anthracene	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzidine	ND	0.23	mg/Kg dry	1	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzo(a)anthracene	0.51	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzo(a)pyrene	0.60	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzo(b)fluoranthene	0.81	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzo(g,h,i)perylene	0.43	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzo(k)fluoranthene	0.31	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Benzoic Acid	ND	1.5	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Bis(2-chloroethoxy)methane	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Bis(2-chloroethyl)ether	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Bis(2-chloroisopropyl)ether	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Bis(2-Ethylhexyl)phthalate	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4-Bromophenylphenylether	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Butylbenzylphthalate	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Carbazole	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4-Chloroaniline	ND	0.98	mg/Kg dry	1	V-34	SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4-Chloro-3-methylphenol	ND	0.98	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2-Chloronaphthalene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2-Chlorophenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4-Chlorophenylphenylether	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Chrysene	0.66	0.25	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Dibenz(a,h)anthracene	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Dibenzofuran	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Di-n-butylphthalate	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
1,2-Dichlorobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
1,3-Dichlorobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
1,4-Dichlorobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
3,3-Dichlorobenzidine	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,4-Dichlorophenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Diethylphthalate	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,4-Dimethylphenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Dimethylphthalate	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4,6-Dinitro-2-methylphenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,4-Dinitrophenol	ND	0.98	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,4-Dinitrotoluene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,6-Dinitrotoluene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Di-n-octylphthalate	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
,2-Diphenylhydrazine/Azobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Fluoranthene	1.1	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Fluorene	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB



Project Location: Beaver St., Waltham, MA

Sample Description:

Sample Description.

Work Order: 19K1404

Pate Received: 11/22/2019 Field Sample #: HB-19 Sample ID: 19K1404-03

Sampled: 11/21/2019 08:30

Sample Matrix: Soil

Semivolatile Organic Compounds by GC/MS

							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
Hexachlorobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Hexachlorobutadiene	ND	0.50	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Hexachlorocyclopentadicne	ND	0.50	mg/Kg dry	I	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Hexachloroethane	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Indeno(1,2,3-cd)pyrene	0.50	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Isophorone	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
1-Methylnaphthalene	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2-Methylnaphthalene	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2-Methylphenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
3/4-Methylphenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Naphthalene	ND	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2-Nitroaniline	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
3-Nitroaniline	ND	0.50	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4-Nitroaniline	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Nitrobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2-Nitrophenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
4-Nitrophenol	ND	0.98	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
N-Nitrosodimethylamine	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
N-Nitrosodiphenylamine/Diphenylamine	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
N-Nitrosodi-n-propylamine	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Pentachloronitrobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Pentachlorophenol	ND	0.50	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Phenanthrene	0.54	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Phenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Pyrene	1.3	0.25	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Pyridine	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
1,2,4,5-Tetrachlorobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
1,2,4-Trichlorobenzene	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,4,5-Trichlorophenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
2,4,6-Trichlorophenol	ND	0.50	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:03	KLB
Surrogates		% Recovery	Recovery Limit	s	Flag/Qual				
2-Fluorophenol	·	66.5	30-130					11/27/19 23:03	
Phenol-d6		68.7	30-130					11/27/19 23:03	
Nitrobenzene-d5		66.6	30-130					11/27/19 23:03	
2-Fluorobiphenyl		68.9	30-130					11/27/19 23:03	
2,4,6-Tribromophenol		72.8	30-130					11/27/19 23:03	
p-Terphenyl-d14		87.2	30-130					11/27/19 23:03	



Project Location: Beaver St., Waltham, MA

Sample Description:

110

0.99

Work Order: 19K1404

11/26/19 11/27/19 16:51 TBC

SW-846 6010D

Date Received: 11/22/2019
Field Sample #: HB-19

Sampled: 11/21/2019 08:30

Sample ID: 19K1404-03
Sample Matrix: Soil

Zinc

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony	ND	2.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Arsenic	6.9	2.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Barium	40	2.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Beryllium	0.31	0.25	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Cadmium	0.57	0.25	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Chromium	26	0.49	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Lead	350	0.74	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Mercury	0.11	0.038	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 9:50	CJV
Nickel	16	0.49	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Sclenium	ND	4.9	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Silver	ND	0.49	mg/Kg dry	ı		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН
Thallium	ND	2.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	MJH
Vanadium	35	0.99	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:33	МЈН

mg/Kg dry



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-19

Sampled: 11/21/2019 08:30

Sample ID: 19K1404-03
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		67.0		% Wt	1		SM 2540G	11/25/19	11/26/19 10:38	adb



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-20

Sampled: 11/21/2019 09:00

Sample ID: 19K1404-04
Sample Matrix: Soil

Semivolatile Organic Compounds by GC/MS

			Semivolatile Organic C	ompounds b	y GC/MS				
							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
Acenaphthene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Acenaphthylene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Acetophenone	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Aniline	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Anthracene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzidine	ND	1.4	mg/Kg dry	1	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzo(a)anthracene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzo(a)pyrene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzo(b)fluoranthene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzo(g,h,i)perylene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzo(k)fluoranthene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Benzoic Acid	ND	2.1	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Bis(2-chloroethoxy)methanc	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Bis(2-chloroethyl)ether	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Bis(2-chloroisopropyl)ether	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Bis(2-Ethylhexyl)phthalate	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4-Bromophenylphenylether	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
utylbenzylphthalate	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Carbazole	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4-Chloroaniline	ND	1.4	mg/Kg dry	1	V-34	SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4-Chloro-3-methylphenol	ND	1.4	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2-Chloronaphthalene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2-Chlorophenol	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4-Chlorophenylphenylether	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Chrysene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Dibenz(a,h)anthracene	ND	0.36	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Dibenzofuran	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Di-n-butylphthalate	ND	0.72	mg/Kg dry	ī		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
1,2-Dichlorobenzene	ND	0.72	mg/Kg dry	ì		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
1,3-Dichlorobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
1,4-Dichlorobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
3,3-Dichlorobenzidine	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2,4-Dichlorophenol	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Diethylphthalate	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2,4-Dimethylphenol	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Dimethylphthalate		0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
	ND					SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4,6-Dinitro-2-methylphenol	ND	0.72	mg/Kg dry	1			11/24/19	11/27/19 23:26	KLB
2,4-Dinitrophenol	ND	1.4	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2,4-Dinitrotoluene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E			
2,6-Dinitrotoluene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
i-n-octylphthalate	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
/,2-Diphenylhydrazine/Azobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Fluoranthene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Fluorene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB

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Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-20

Sampled: 11/21/2019 09:00

Sample ID: 19K1404-04

Sample Matrix: Soil

p-Terphenyl-d14

Semivolatile Organ	c Compounds	bv	GC/MS
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Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Hexachlorobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Hexachlorobutadiene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Hexachlorocyclopentadiene	ND	0.72	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Hexachloroethane	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Indeno(1,2,3-cd)pyrene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Isophorone	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
1-Methylnaphthalene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2-Methylnaphthalene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2-Methylphenol	ND	0.72	mg/Kg dry	ī		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
3/4-Methylphenol	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Naphthalene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2-Nitroaniline	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
3-Nitroaniline	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4-Nitroaniline	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Nitrobenzene	ND	0.72	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2-Nitrophenol	ND	0.72	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
4-Nitrophenol	ND	1.4	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
N-Nitrosodimethylamine	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
I-Nitrosodiphenylamine/Diphenylamine	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
N-Nitrosodi-n-propylamine	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Pentachloronitrobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Pentachlorophenol	ND	0.72	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Phenanthrene	ND	0.36	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Phenol	ND	0.72	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Pyrene	ND	0.36	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Pyridine	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
1,2,4,5-Tetrachlorobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-È	11/24/19	11/27/19 23:26	KLB
1,2,4-Trichlorobenzene	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2,4,5-Trichlorophenol	ND	0.72	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
2,4,6-Trichlorophenol	ND	0.72	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/27/19 23:26	KLB
Surrogates		% Recovery	Recovery Limits		Flag/Qual				
2-Fluorophenol		63.5	30-130					11/27/19 23:26	
Phenol-d6		68.9	30-130					11/27/19 23:26	
Nitrobenzene-d5		67.4	30-130					11/27/19 23:26	
2-Fluorobiphenyl		71.3	30-130					11/27/19 23:26 11/27/19 23:26	
2,4,6-Tribromophenol		76.6	30-130					11/2//19 23:26	

30-130

96.6

11/27/19 23:26



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-20

Sampled: 11/21/2019 09:00

Sample ID: 19K1404-04
Sample Matrix: Soil

			Metals Analy	yses (Total)					
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony	ND	3.5	mg/Kg dry	l		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Arsenic	7.3	3.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЛН
Barium	110	3.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Beryllium	0.66	0.35	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Cadmium	0.42	0.35	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Chromium	14	0.70	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Lead	71	1.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Mercury	0.10	0.055	mg/Kg dry	i		SW-846 7471B	11/26/19	11/27/19 9:56	CJV
Nickel	11	0.70	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	MJH
Selenium	ND	7.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Silver	ND	0.70	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Thallium	ND	3.5	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Vanadium	38	1.4	mg/Kg dry	Ĭ		SW-846 6010D	11/26/19	11/27/19 3:39	МЈН
Zinc	63	1.4	mg/Kg dry	I		SW-846 6010D	11/26/19	11/27/19 16:57	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-20

Sampled: 11/21/2019 09:00

Sample ID: 19K1404-04 Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		46.3		% Wt	1		SM 2540G	11/25/19	11/26/19 10:38	adb

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39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019

Field Sample #: HB-22

Sampled: 11/21/2019 10:30

Sample ID: 19K1404-05 Sample Matrix: Soil

			Semivolatile Organic C	ompounds b	y GC/MS				
							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
Acenaphthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Acenaphthylene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Acetophenone	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Aniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Anthracene	ND	0.32	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzidine	ND	1.2	mg/Kg dry	1	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzo(a)anthracene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzo(a)pyrene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzo(b)fluoranthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzo(g,h,i)perylene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzo(k)fluoranthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Benzoic Acid	ND	1.9	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Bis(2-chloroethoxy)methane	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Bis(2-chloroethyl)ether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Bis(2-chloroisopropyl)ether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Bis(2-Ethylhexyl)phthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4-Bromophenylphenylether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
sutylbenzylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Carbazole	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4-Chloroaniline	ND	1.2	mg/Kg dry	1	V-34	SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4-Chloro-3-methylphenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2-Chloronaphthalene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2-Chlorophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4-Chlorophenylphenylether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Chrysene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Dibenz(a,h)anthracene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Dibenzofuran	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Di-n-butylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1,2-Dichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1,3-Dichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1,4-Dichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
3,3-Dichlorobenzidine	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,4-Dichlorophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Diethylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,4-Dimethylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Dimethylphthalate	ND	0.63	mg/Kg dry	Ĭ		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4,6-Dinitro-2-methylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,4-Dinitrophenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,4-Dinitrotoluene	ND	0.63	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,6-Dinitrotoluene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
i-n-octylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1,2-Diphenylhydrazine/Azobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Fluoranthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Fluorene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
	IND	0.52	ing its dry	•		2		D 00	-4.04



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Pate Received: 11/22/2019 ield Sample #: HB-22

Sampled: 11/21/2019 10:30

Sample ID: 19K1404-05
Sample Matrix: Soil

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Hexachlorobenzene	ND	0,63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Hexachlorobutadiene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Hexachlorocyclopentadiene	ND	0.63	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Hexachloroethane	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Indeno(1,2,3-cd)pyrene	ND	0.32	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Isophorone	ND	0.63	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1-Methylnaphthalene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2-Methylnaphthalene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2-Methylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
3/4-Methylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Naphthalene	ND	0.32	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2-Nitroaniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
3-Nitroaniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4-Nitroaniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Nitrobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2-Nitrophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
4-Nitrophenol	ND	1.2	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
N-Nitrosodimethylamine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
.4-Nitrosodiphenylamine/Diphenylamine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
N-Nitrosodi-n-propylamine	ND	0.63	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Pentachloronitrobenzene	ND	0.63	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Pentachlorophenol	ND	0.63	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Phenanthrene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Phenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Pyrene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Pyridine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1,2,4,5-Tetrachlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
1,2,4-Trichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,4,5-Trichlorophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
2,4,6-Trichlorophenol	ND	0,63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:49	KLB
Surrogates		% Recovery	Recovery Limit	s	Flag/Qual				
2-Fluorophenol		69.7	30-130					11/27/19 23:49	
Phenol-d6		72.7	30-130					11/27/19 23:49	
Nitrobenzene-d5		72.5	30-130					11/27/19 23:49 11/27/19 23:49	
2-Fluorobiphenyl		76.8	30-130 30-130					11/27/19 23:49	
2,4,6-Tribromophenol p-Terphenyl-d14		81.4 105	30-130					11/27/19 23:49	



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-22

Sampled: 11/21/2019 10:30

Sample ID: 19K1404-05

Sample Matrix: Soil

Outro Water. Con	Metals Analyses (Total)											
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst			
Antimony	ND	3.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Arsenic	5.4	3.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Barium	70	3.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Beryllium	0.81	0.32	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	MJH			
Cadmium	0.41	0.32	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	MJH			
Chromium	13	0.63	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Lead	45	0.95	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Mercury	0.11	0.045	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 9:57	CJV			
Nickel	10	0.63	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Selenium	ND	6.3	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	MJH			
Silver	ND	0.63	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Thallium	ND	3.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Vanadium	41	1.3	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:02	МЈН			
Zinc	91	1.3	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 17:14	TBC			



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-22

Sampled: 11/21/2019 10:30

Sample ID: 19K1404-05
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		53.7		% Wı	1		SM 2540G	11/25/19	11/26/19 10:39	adb



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Jate Received: 11/22/2019
Field Sample #: HB-23

Sampled: 11/21/2019 11:30

Sample ID: 19K1404-06
Sample Matrix: Soil

Semivolatile	Organic	Compounds	by	GC/MS
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Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Acenaphthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Acenaphthylene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Acetophenone	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Aniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Anthracene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzidine	ND	1.2	mg/Kg dry	1	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzo(a)anthracene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzo(a)pyrene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzo(b)fluoranthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzo(g,h,i)perylene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzo(k)fluoranthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Benzoic Acid	ND	1.9	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Bis(2-chloroethoxy)methane	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Bis(2-chloroethyl)ether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Bis(2-chloroisopropyl)ether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Bis(2-Ethylhexyl)phthalate	ND	0.63	mg/Kg dry	ī		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4-Bromophenylphenylether	ND	0.63	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
utylbenzylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Carbazole	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4-Chloroaniline	ND	1.2	mg/Kg dry	1	V-34	SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4-Chloro-3-methylphenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2-Chloronaphthalene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2-Chlorophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4-Chlorophenylphenylether	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Chrysene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Dibenz(a,h)anthracene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Dibenzofuran	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Di-n-butylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
1,2-Dichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
1,3-Dichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
1,4-Dichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
3,3-Dichlorobenzidine	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,4-Dichlorophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Diethylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,4-Dimethylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Dimethylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4,6-Dinitro-2-methylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,4-Dinitrophenol	ND	1.2	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,4-Dinitrotoluene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,6-Dinitrotoluene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Di-n-octylphthalate	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Fluoranthene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Fluorene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB

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Work Order: 19K1404



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL, 413/525-2332

Project Location: Beaver St., Waltham, MA

Sample Description:

Date Received: 11/22/2019 Field Sample #: HB-23 Sample ID: 19K1404-06

Sample Matrix: Soil

Sampled: 11/21/2019 11:30

Semivolatile Organic Compounds by GC/MS

Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Hexachlorobenzene	ND	0,63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Hexachlorobutadiene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Hexachlorocyclopentadiene	ND	0.63	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Hexachloroethane	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Indeno(1,2,3-cd)pyrene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Isophorone	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
I-Methylnaphthalene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2-Methylnaphthalene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2-Methylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
3/4-Methylphenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Naphthalene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2-Nitroaniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
3-Nitroaniline	ND	0.63	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4-Nitroaniline	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Nitrobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2-Nitrophenol	ND	0.63	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
4-Nitrophenol	ND	1.2	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
N-Nitrosodimethylamine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
N-Nitrosodiphenylamine/Diphenylamine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
N-Nitrosodi-n-propylamine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Pentachloronitrobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Pentachlorophenol	ND	0.63	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Phenanthrene	ND	0.32	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Phenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Ругепе	ND	0.32	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Pyridine	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
1,2,4,5-Tetrachlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
1,2,4-Trichlorobenzene	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,4,5-Trichlorophenol	ND	0.63	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
2,4,6-Trichlorophenol	ND	0.63	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:11	KLB
Surrogates		% Recovery	Recovery Limits	5	Flag/Qual			- Annual Control Contr	
2-Fluorophenol		67.3	30-130					11/28/19 0:11	
Phenol-d6		68.6	30-130					11/28/19 0:11	
Nitrobenzene-d5		69.7	30-130					11/28/19 0:11	
2-Fluorobiphenyl		69.9	30-130					11/28/19 0:11	
2,4,6-Tribromophenol		73.9	30-130					11/28/19 0:11	
p-Terphenyl-d14		94.6	30-130					11/28/19 0:11	



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-23

Sampled: 11/21/2019 11:30

Sample ID: 19K1404-06
Sample Matrix: Soil

		7.1.							
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony	ND	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	МЈН
Arsenic	4.9	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	МЈН
Barium	70	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	MJH
Beryllium	0.81	0.30	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	МЈН
Cadmium	0.45	0.30	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	МЈН
Chromium	13	0.61	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	MJH
Lead	44	0.91	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	МЈН
Mercury	0.11	0.047	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 9:59	CJV
Nickel	10	0.61	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	MJH
Selenium	ND	6.1	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	MJH
Silver	ND	0.61	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	MJH
Thallium	ND	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	MJH
Vanadium	41	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:08	МЈН
Zinc	90	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 17:19	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-23

Sampled: 11/21/2019 11:30

Sample ID: 19K1404-06
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids	53.5		% Wt	1		SM 2540G	11/25/19	11/26/19 10:39	adb

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39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019

Field Sample #: HB-24

Sampled: 11/21/2019 12:30

Sample ID: 19K1404-07
Sample Matrix: Soil

			Semivolatile Organic C	ompounds b	y GC/MS				
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Acenaphthene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Acenaphthylene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Acetophenone	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Aniline	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Anthracene	ND	0.23	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzidine	ND	0.91	mg/Kg dry	ı	V-04, V-05, V-35	SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzo(a)anthracene	0.51	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzo(a)pyrene	0.53	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzo(b)fluoranthene	0.75	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzo(g,h,i)perylene	0.32	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzo(k)fluoranthene	0.29	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Benzoic Acid	ND	1.4	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Bis(2-chloroethoxy)methane	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Bis(2-chloroethyl)ether	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Bis(2-chloroisopropyl)ether	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Bis(2-Ethylhexyl)phthalate	3.5	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4-Bromophenylphenylether	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Butylbenzylphthalate	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Carbazole	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4-Chloroaniline	ND	0.91	mg/Kg dry	1	V-34	SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4-Chloro-3-methylphenol	ND	0.91	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2-Chloronaphthalene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2-Chlorophenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4-Chlorophenylphenylether	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Chrysene	0.63	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Dibenz(a,h)anthracene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Dibenzofuran	ND	0.47	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Di-n-butylphthalate	ND	0.47	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
1,2-Dichlorobenzene	ND	0.47	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
1,3-Dichlorobenzene	ND	0.47	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
1,4-Dichlorobenzene	ND	0.47	mg/Kg dry	t		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
3,3-Dichlorobenzidine	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,4-Dichlorophenol	ND	0.47	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Diethylphthalate	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,4-Dimethylphenol	ND	0.47	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Dimethylphthalate	ND	0.47	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4,6-Dinitro-2-methylphenol	ND	0.47	mg/Kg dry	ì		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,4-Dinitrophenol	ND	0.91	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,4-Dinitrotoluene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,6-Dinitrotoluene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Di-n-octylphthalate	ND	0.47	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
1,2-Diphenylhydrazine/Azobenzene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Fluoranthene	0.97	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Fluorene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB



Project Location: Beaver St., Waltham, MA

85.6

30-130

Sample Description:

Work Order: 19K1404

)ate Received: 11/22/2019 rield Sample #: HB-24

Sampled: 11/21/2019 12:30

Sample ID: 19K1404-07

p-Terphenyl-d14

Sample Matrix: Soil		Sem	ivolatile Organic Co	mpounds by	GC/MS				
							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analys
Hexachlorobenzene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Hexachlorobutadiene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Hexachlorocyclopentadiene	ND	0.47	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Hexachloroethane	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Indeno(1,2,3-cd)pyrene	0.38	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Isophorone	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
I-Methylnaphthalene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2-Methylnaphthalene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2-Methylphenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
3/4-Methylphenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Naphthalene	ND	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2-Nitroaniline	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
3-Nitroaniline	ND	0.47	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4-Nitroaniline	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Nitrobenzene	ND	0.47	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2-Nitrophenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
4-Nitrophenol	ND	0.91	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
N-Nitrosodimethylamine	ND	0.47	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
N-Nitrosodiphenylamine/Diphenylamine	ND	0.47	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
N-Nitrosodi-n-propylamine	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Pentachloronitrobenzene	ND	0.47	mg/Kg dry	l		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Pentachlorophenol	ND	0.47	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Phenanthrene	0.55	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Phenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Pyrene	1.2	0.23	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Pyridine	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
1,2,4,5-Tetrachlorobenzene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
1,2,4-Trichlorobenzene	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,4,5-Trichlorophenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
2,4,6-Trichlorophenol	ND	0.47	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:34	KLB
Surrogates		% Recovery	Recovery Limits	· · · · · · · · · · · · · · · · · · ·	Flag/Qual				
2-Fluorophenol		63.5	30-130		and the second s			11/28/19 0:34	
Phenol-d6		66.4	30-130					11/28/19 0:34	
Nitrobenzene-d5		63.2	30-130					11/28/19 0:34	
2-Fluorobiphenyl		66.2 75.6	30-130 30-130					11/28/19 0:34 11/28/19 0:34	
2,4,6-Tribromophenol		15,0	30-130					11/20/19 0.34	

11/28/19 0:34



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-24

Sampled: 11/21/2019 12:30

Sample ID: 19K1404-07
Sample Matrix: Soil

			Metals Analy	yses (Total)					
							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
Antimony	ND	2.4	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Arsenic	5.6	2.4	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Barium	40	2.4	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	MJH
Beryllium	0.31	0.24	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Cadmium	0.45	0.24	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	MJH
Chromium	27	0.48	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Lead	290	0.72	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Mercury	0.095	0.034	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 10:00	CJV
Nickel	14	0.48	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Selenium	ND	4.8	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Silver	ND	0.48	mg/Kg dry	ı		SW-846 6010D	11/26/19	11/27/19 4:15	MJH
Thallium	ND	2.4	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	MJH
Vanadium	31	0.95	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:15	МЈН
Zinc	100	0.95	mg/Kg dry	I		SW-846 6010D	11/26/19	11/27/19 17:24	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-24

Sampled: 11/21/2019 12:30

Sample ID: 19K1404-07
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		70.8		% Wt	i		SM 2540G	11/25/19	11/26/19 10:39	adb



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-25

Sampled: 11/21/2019 13:00

Fluorene

ND

0.30

mg/Kg dry

1

Sample ID: 19K1404-08 Sample Matrix: Soil Semivolatile Organic Compounds by GC/MS Date Date/Time RL Results Units Dilution Flag/Qual Analyte Method Prepared Analyzed Analyst Acenaphthene ND 0.30 mg/Kg dry SW-846 8270D-E 11/24/19 ı 11/28/19 0:56 KLB Acenaphthylene ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLR Acetophenone ND 0.59 SW-846 8270D-E 11/24/19 11/28/19 0:56 mg/Kg dry 1 KLB Aniline ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Anthracene ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Benzidine ND V-04, V-05, V-35 SW-846 8270D-E 11/24/19 11/28/19 0:56 1.1 mg/Kg dry KLB Benzo(a)anthracene ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Benzo(a)pyrene ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Benzo(b)fluoranthene ND 0.30 mg/Kg dry I SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Benzo(g,h,i)perylene ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Benzo(k)fluoranthene ND SW-846 8270D-E 0.30 mg/Kg dry 1 11/24/19 11/28/19 0:56 KLB Benzoic Acid SW-846 8270D-E ND 1.7 1 L-04 11/24/19 11/28/19 0:56 KLB mg/Kg dry Bis(2-chloroethoxy)methane ND 0.59 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry Bis(2-chloroethyl)ether ND 0.59 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry Bis(2-chloroisopropyl)ether ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Bis(2-Ethylhexyl)phthalate ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 4-Bromophenylphenylether ND 0.59 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry Butylbenzylphthalate ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Carbazole ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 4-Chloroaniline ND 1.1 mg/Kg dry 1 V-34 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 4-Chloro-3-methylphenol SW-846 8270D-E 11/24/19 ND 1.1 1 11/28/19 0:56 KLB mg/Kg dry 2-Chloronaphthalene SW-846 8270D-E ND 0.59 11/24/19 11/28/19 0:56 KI.B mg/Kg dry 1 2-Chlorophenol ND 0.59 SW-846 8270D-E 11/24/19 11/28/19 0:56 1 KLB mg/Kg dry 4-Chlorophenylphenylether ND 0.59 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry 1 Chrysene ND 0.30 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Dibenz(a,h)anthracene SW-846 8270D-E 11/24/19 11/28/19 0:56 ND 0.30 mg/Kg dry KLB Dibenzofuran ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Di-n-butylphthalate ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 1,2-Dichlorobenzene ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 1.3-Dichlorobenzene ND 0.59 mg/Kg dry ì SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 1.4-Dichlorobenzene SW-846 8270D-E 11/24/19 ND 0.59 mg/Kg dry 1 11/28/19 0:56 KI.B 3,3-Dichlorobenzidine ND SW-846 8270D-E 11/24/19 11/28/19 0:56 0.30 1 KLB mg/Kg dry 2,4-Dichlorophenol ND 0.59 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry Diethylphthalate ND 0.59 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 1 mg/Kg dry 2,4-Dimethylphenol ND 0.59 mg/Kg dry SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 1 Dimethylphthalate ND 0.59 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry 4,6-Dinitro-2-methylphenol SW-846 8270D-E 11/24/19 11/28/19 0:56 ND 0.59 mg/Kg dry 1 KLB 2,4-Dinitrophenol ND SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB 1.1 mg/Kg dry 1 2,4-Dinitrotoluene ND 0.59 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry 2,6-Dinitrotoluene ND 0.59 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB mg/Kg dry Di-n-octylphthalate ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB ,2-Diphenylhydrazine/Azobenzene ND 0.59 mg/Kg dry 1 SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB Fluoranthene SW-846 8270D-E 11/24/19 11/28/19 0:56 KLB ND 0.30 mg/Kg dry 1

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KLB

11/28/19 0:56

SW-846 8270D-E

11/24/19



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-25 Sample ID: 19K1404-08

Sampled: 11/21/2019 13:00

Sample Matrix: Soil Semivolatile Organic Compounds by GC/MS

		Sem	ivolatile Organic C	ompounds by	GC/MS				
							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
Hexachlorobenzene	ND	0.59	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Hexachlorobutadiene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Hexachlorocyclopentadiene	ND	0.59	mg/Kg dry	Į.	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Hexachloroethane	ND	0.59	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Indeno(1,2,3-cd)pyrene	ND	0.30	mg/Kg dry	İ		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Isophorone	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
1-Methylnaphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
2-Methylnaphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
2-Methylphenol	ND	0.59	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
3/4-Methylphenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Naphthalene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
2-Nitroaniline	ND	0.59	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
3-Nitroaniline	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
4-Nitroaniline	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Nitrobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
2-Nitrophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
4-Nitrophenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
N-Nitrosodimethylamine	ND	0.59	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
N-Nitrosodiphenylamine/Diphenylamine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
N-Nitrosodi-n-propylamine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Pentachloronitrobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Pentachiorophenol	ND	0.59	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Phenanthrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Phenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Pyrene	ND	0.30	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Pyridine	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
1,2,4,5-Tetrachlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
1,2,4-Trichlorobenzene	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
2,4,5-Trichlorophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
2,4,6-Trichlorophenol	ND	0.59	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:56	KLB
Surrogates		% Recovery	Recovery Limits	S	Flag/Qual				
2-Fluorophenol		50.8	30-130					11/28/19 0:56	
Phenol-d6		52.3	30-130					11/28/19 0:56	
Nitrobenzene-d5		52.2	30-130					11/28/19 0:56	
2-Fluorobiphenyl		53.5	30-130					11/28/19 0:56	
2,4,6-Tribromophenol		56.9	30-130					11/28/19 0:56	
p-Terphenyl-d14		67.9	30-130					11/28/19 0:56	



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019

Field Sample #: HB-25

Sampled: 11/21/2019 13:00

Sample ID: 19K1404-08
Sample Matrix: Soil

			Metals Analy	ses (Total)					
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony	ND	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Arsenic	7.4	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Barium	85	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Beryllium	0.67	0.30	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Cadmium	0.32	0.30	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	MJH
Chromium	14	0.59	mg/Kg dry	ı		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Lead	73	0.89	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Mercury	0.21	0.042	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 10:02	CJV
Nickel	11	0.59	mg/Kg dry	I		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Selenium	ND	5.9	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Silver	ND	0.59	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Thallium	ND	3.0	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Vanadium	45	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:21	МЈН
Zinc	53	1.2	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 17:30	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-25

Sampled: 11/21/2019 13:00

Sample ID: 19K1404-08
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		56.8		% Wı	1		SM 2540G	11/25/19	11/26/19 10:46	adb



Project Location: Beaver St., Waltham, MA

Sample Description: Work Order: 19K1404

Date Received: 11/22/2019 ield Sample #: HB-26

Sampled: 11/21/2019 13:30

Sample ID: 19K1404-09 Sample Matrix: Soil

Semivolatile Organic Compounds by GC/MS

			Semivolatile Organic C	ompounds by	GCINS		.	D 4 7001	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Acenaphthene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Acenaphthylene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Acetophenone	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Aniline	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Anthracene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzidine	ND	1.1	mg/Kg dry	1	V-05	SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzo(a)anthracene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzo(a)pyrene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzo(b)fluoranthene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzo(g,h,i)perylene	ND	0.27	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzo(k)fluoranthene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Benzoic Acid	ND	1.6	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Bis(2-chloroethoxy)methane	ND	0.55	mg/Kg dry	ì		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Bis(2-chloroethyl)ether	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Bis(2-chloroisopropyl)ether	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Bis(2-Ethylhexyl)phthalate	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4-Bromophenylphenylether	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Butylbenzylphthalate	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
arbazole	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4-Chloroaniline	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4-Chloro-3-methylphenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Chloronaphthalene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Chlorophenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4-Chlorophenylphenylether	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Chrysene	ND	0.27	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Dibenz(a,h)anthracene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Dibenzofuran	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Di-n-butylphthalate	ND	0.55	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
1,2-Dichlorobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
1,3-Dichlorobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
1,4-Dichlorobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
3,3-Dichlorobenzidine	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,4-Dichlorophenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Diethylphthalate	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,4-Dimethylphenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Dimethylphthalate	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4,6-Dinitro-2-methylphenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,4-Dinitrophenol	ND	1.1	mg/Kg dry	1	V-20, V-04	SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,4-Dinitrotoluene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,6-Dinitrotoluene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Di-n-octylphthalate	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Diphenylhydrazine/Azobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
duoranthene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Fluorene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL

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Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019

Sampled: 11/21/2019 13:30 Field Sample #: HB-26

Sample ID: 19K1404-09 Sample Matrix: Soil

Semivolatile Organic Compounds by GC/MS

					,				
	ъ	n.	WT . **.	D. 11	F1 (0)	34.45.3	Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
Hexachlorobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Hexachlorobutadiene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Hexachlorocyclopentadiene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Hexachioroethane	ND	0.55	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Indeno(1,2,3-cd)pyrene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Isophorone	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
1-Methylnaphthalene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Methylnaphthalene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Methylphenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
3/4-Methylphenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Naphthalene	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Nitroaniline	ND	0.55	mg/Kg dry	i	V-35	SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
3-Nitroaniline	ND	0.55	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4-Nitroaniline	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Nitrobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2-Nitrophenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
4-Nitrophenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
N-Nitrosodimethylamine	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
N-Nitrosodiphenylamine/Diphenylamine	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
N-Nitrosodi-n-propylamine	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Pentachloronitrobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Pentachlorophenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Phenanthrene	ND	0.27	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Phenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Рутепе	ND	0.27	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Pyridine	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
1,2,4,5-Tetrachlorobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
1,2,4-Trichlorobenzene	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,4,5-Trichlorophenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
2,4,6-Trichlorophenol	ND	0.55	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/27/19 23:58	BGL
Surrogates		% Recovery	Recovery Limit	S	Flag/Qual				
2-Fluorophenol		67.7	30-130					11/27/19 23:58	
Phenol-d6		69.9	30-130					11/27/19 23:58	
Nitrobenzene-d5		68.8	30-130					11/27/19 23:58	
2-Fluorobiphenyl		72.0	30-130					11/27/19 23:58	
2,4,6-Tribromophenol		76.6	30-130					11/27/19 23:58	
p-Terphenyl-d14		76.1	30-130					11/27/19 23:58	



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-26

Sampled: 11/21/2019 13:30

Sample ID: 19K1404-09
Sample Matrix: Soil

Odinoto Maria. Ook			Metals Analy	ses (Total)					
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony	ND	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Arsenic	4.7	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Barium	62	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	MJH
Beryllium	0.76	0.27	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	MJH
Cadmium	0.39	0.27	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Chromium	12	0.54	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Lead	42	0.81	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Mercury	0.11	0.041	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 10:04	CJV
Nickel	8.9	0.54	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Selenium	ND	5.4	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	MJH
Silver	ND	0.54	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Thallium	ND	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Vanadium	37	1.1	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:27	МЈН
Zinc	79	1.1	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 17:35	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Pate Received: 11/22/2019 Field Sample #: HB-26

Sampled: 11/21/2019 13:30

Sample ID: 19K1404-09
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

								Date	Date/Time	
	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids		60.7		% Wı	1		SM 2540G	11/25/19	11/26/19 10:47	adb

Work Order: 19K1404



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332

Project Location: Beaver St., Waltham, MA

Sample Description:

Pate Received: 11/22/2019 Field Sample #: HB-27 Sample ID: 19K1404-10

Sample Matrix: Soil

Sampled: 11/21/2019 14:30

Semivolatile Organic Compounds by GC/MS

Amabuta	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Analyte Acenaphthene	ND	0.28	mg/Kg dry	l	riag/Quai	SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Acenaphthylene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Acetophenone	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Aniline	ND	0.56	mg/Kg dry	1	•	SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Anthracene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzidine	ND	1.1	mg/Kg dry	ı	V-05	SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzo(a)anthracene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzo(a)pyrene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzo(b)fluoranthene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzo(g,h,i)perylene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzo(k)fluoranthene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Benzoic Acid	ND	1.6	mg/Kg dry	1	L-04	SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Bis(2-chloroethoxy)methane	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Bis(2-chloroethyl)ether	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Bis(2-chloroisopropyl)ether	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Bis(2-Ethylhexyl)phthalate	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4-Bromophenylphenylether	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Butylbenzylphthalate	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Larbazole	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4-Chloroaniline	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4-Chloro-3-methylphenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2-Chloronaphthalene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2-Chlorophenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4-Chlorophenylphenylether	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Chrysene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Dibenz(a,h)anthracene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Dibenzofuran	ND	0.56	mg/Kg dry	ı		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Di-n-butylphthalate	ND	0.56	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
1,2-Dichlorobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
1,3-Dichlorobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
1,4-Dichlorobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
3,3-Dichlorobenzidine	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,4-Dichlorophenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Diethylphthalate	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,4-Dimethylphenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Dimethylphthalate	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4,6-Dinitro-2-methylphenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,4-Dinitrophenol	ND	1.1	mg/Kg dry	1	V-04, V-20	SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,4-Dinitrotoluene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,6-Dinitrotoluene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Di-n-octylphthalate	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
,2-Diphenylhydrazinc/Azobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Fluoranthene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Fluorene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL

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Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Jate Received: 11/22/2019

Field Sample #: HB-27

Sampled: 11/21/2019 14:30

Sample ID: 19K1404-10
Sample Matrix: Soil

Sample Matrix: Soil	***************************************	Sem	ivolatile Organic C	ompounds by	GC/MS				
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Hexachlorobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Hexachlorobutadiene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Hexachlorocyclopentadiene	ND	0.56	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Hexachloroethane	ND	0.56	mg/Kg dry	I		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Indeno(1,2,3-cd)pyrene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Isophorone	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
1-Methylnaphthalene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2-Methylnaphthalene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2-Methylphenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
3/4-Methylphenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Naphthalene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2-Nitroaniline	ND	0.56	mg/Kg dry	1	V-35	SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
3-Nitroaniline	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4-Nitroaniline	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Nitrobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2-Nitrophenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
4-Nitrophenol	ND	1.1	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
N-Nitrosodimethylamine	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
N-Nitrosodiphenylamine/Diphenylamine	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
N-Nitrosodi-n-propylamine	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Pentachloronitrobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Pentachlorophenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Phenanthrene	ND	0.28	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Phenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Pyrene	ND	0.28	mg/Kg dry	i		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Pyridine	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
1,2,4,5-Tetrachlorobenzene	ND	0.56	mg/Kg dry	ī		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
1,2,4-Trichlorobenzene	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,4,5-Trichlorophenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
2,4,6-Trichlorophenol	ND	0.56	mg/Kg dry	1		SW-846 8270D-E	11/24/19	11/28/19 0:22	BGL
Surrogates		% Recovery	Recovery Limit	s	Flag/Qual				
2-Fluorophenol		54.4	30-130					11/28/19 0:22	
Phenol-d6		57.9	30-130					11/28/19 0:22	
Nitrobenzene-d5		56.2	30-130					11/28/19 0:22	
2-Fluorobiphenyl		59.8	30-130					11/28/19 0:22	
2,4,6-Tribromophenol		64.1	30-130					11/28/19 0:22 11/28/19 0:22	
p-Terphenyl-d14		64.4	30-130					11/20/19 0:22	



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019 Field Sample #: HB-27 Sample ID: 19K1404-10

Sample Matrix: Soil

Sampled: 11/21/2019 14:30

Metals Analyses (Total)

	Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Date Prepared	Date/Time Analyzed	Analyst
Antimony		ND	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Arsenic		4.9	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Barium		66	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Beryllium		0.83	0,27	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Cadmium		0.40	0.27	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Chromium		12	0.55	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Lead		42	0.82	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Mercury		0.12	0.039	mg/Kg dry	1		SW-846 7471B	11/26/19	11/27/19 10:05	CJV
Nickel		9.3	0.55	mg/Kg dry	ì		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Selenium		ND	5.5	mg/Kg dry	ı		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Silver		ND	0.55	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Thallium		ND	2.7	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Vanadium		38	1.1	mg/Kg dry	1		SW-846 6010D	11/26/19	11/27/19 4:34	МЈН
Zinc		84	1.1	mg/Kg dry	i		SW-846 6010D	11/26/19	11/27/19 17:40	TBC



Project Location: Beaver St., Waltham, MA

Sample Description:

Work Order: 19K1404

Date Received: 11/22/2019
Field Sample #: HB-27

Sampled: 11/21/2019 14:30

Sample ID: 19K1404-10
Sample Matrix: Soil

Conventional Chemistry Parameters by EPA/APHA/SW-846 Methods (Total)

							Date	Date/Time	
Analyte	Results	RL	Units	Dilution	Flag/Qual	Method	Prepared	Analyzed	Analyst
% Solids	59.9		% Wı	1		SM 2540G	11/25/19	11/26/19 10:47	adb



Sample Extraction Data

Prep Method: % Solids-SM 2540G

Lab Number [Field ID]	Batch	Date
19K1404-01 [HB-16]	B246947	11/25/19
19K1404-02 [HB-17]	B246947	11/25/19
19K1404-03 [HB-19]	B246947	11/25/19
19K1404-04 [HB-20]	B246947	11/25/19
19K1404-05 [HB-22]	B246947	11/25/19
19K1404-06 [HB-23]	B246947	11/25/19
19K1404-07 [HB-24]	B246947	11/25/19
19K1404-08 [HB-25]	B246947	11/25/19
19K1404-09 [HB-26]	B246947	11/25/19
19K1404-10 [HB-27]	B246947	11/25/19

Prep Method: SW-846 3050B-SW-846 6010D

Lab Number [Field ID]	Batch	Initial [g]	Final [mL]	Date	
19K1404-01 [HB-16]	B247118	1.49	50.0	11/26/19	
19K1404-02 [HB-17]	B247118	1.52	50.0	11/26/19	
19K1404-03 [HB-19]	B247118	1.51	50.0	11/26/19	
19K1404-04 [HB-20]	B247118	1.55	50.0	11/26/19	
19K1404-05 [HB-22]	B247118	1.47	50.0	11/26/19	
19K1404-06 [HB-23]	B247118	1.54	50.0	11/26/19	
19K1404-07 [HB-24]	B247118	1.48	50.0	11/26/19	
19K1404-08 [HB-25]	B247118	1.48	50.0	11/26/19	
[1404-09 [HB-26]	B247118	1.52	50.0	11/26/19	
ıУК1404-10 [HB-27]	B247118	1.53	50.0	11/26/19	

Prep Method: SW-846 7471-SW-846 7471B

Lab Number [Field ID]	Batch	Initial [g]	Final [mL]	Date	
19K1404-01 [HB-16]	B247114	0.617	50.0	11/26/19	
19K1404-02 [HB-17]	B247114	0.582	50.0	11/26/19	
19K1404-03 [HB-19]	B247114	0.588	50.0	11/26/19	
19K1404-04 [HB-20]	B247114	0.586	50.0	11/26/19	
19K1404-05 [HB-22]	B247114	0.623	50.0	11/26/19	
19K1404-06 [HB-23]	B247114	0.598	50.0	11/26/19	
19K1404-07 [HB-24]	B247114	0.619	50.0	11/26/19	
19K1404-08 [HB-25]	B247114	0.629	50.0	11/26/19	
19K1404-09 [HB-26]	B247114	0.606	50.0	11/26/19	
19K1404-10 [HB-27]	B247114	0.639	50.0	11/26/19	

Prep Method: SW-846 3546-SW-846 8270D-E

Lab Number [Field ID]	Batch	Initial [g]	Final (mL)	Date	
19K1404-01 [HB-16]	B246869	30.1	1.00	11/24/19	
19K1404-02 [HB-17]	B246869	30.5	1.00	11/24/19	
19K1404-03 [HB-19]	B246869	30.3	1.00	11/24/19	
19K1404-04 [HB-20]	B246869	30.4	1.00	11/24/19	
19K1404-05 [HB-22]	B246869	30.1	1.00	11/24/19	
`K1404-06 [HB-23]	B246869	30.1	1.00	11/24/19	
.1404-07 [HB-24]	B246869	30.7	1.00	11/24/19	
19K1404-08 [HB-25]	B246869	30.4	1.00	11/24/19	
19K1404-09 [HB-26]	B246869	30.7	1.00	11/24/19	



Sample Extraction Data

Prep Method: SW-846 3546-SW-846 8270D-E

19K1404-10 [HB-27] B246869 30.6 1.00 11/24/19	Lab Number [Field ID]	Batch	Initial [g]	Final (mL)	Date
	19K1404-10 [HB-27]	B246869	30.6	1.00	11/24/19



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332 **QUALITY CONTROL**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B246869 - SW-846 3546										
Blank (B246869-BLK1)			j	Prepared: 11/	/24/19 Analy:	zed: 11/27/19)			
Acenaphthene	ND	0.17	mg/Kg wet							
Acenaphthylene	ND	0.17	mg/Kg wet							
Acetophenone	ND	0.34	mg/Kg wet							
Aniline	ND	0.34	mg/Kg wet							
Anthracene	ND	0.17	mg/Kg wet							
Benzidine	ND	0.66	mg/Kg wet							V-04, V-05, V-35
Benzo(a)anthracene	ND	0.17	mg/Kg wet							
Benzo(a)pyrene	ND	0.17	mg/Kg wet							
Benzo(b)fluoranthene	ND	0.17	mg/Kg wet							
Benzo(g,h,i)perylene	ND	0.17	mg/Kg wet							
Benzo(k)fluoranthene	ND	0.17	mg/Kg wet							
Benzoic Acid	ND	1.0	mg/Kg wet							L-04
Bis(2-chloroethoxy)methane	ND	0.34	mg/Kg wet							
Bis(2-chloroethyl)ether	ND	0.34	mg/Kg wet							
Bis(2-chloroisopropyl)ether	ND	0.34	mg/Kg wet							
Bis(2-Ethylhexyl)phthalate	ND	0.34	mg/Kg wet							
4-Bromophenylphenylether Butylbenzylphthalate	ND ND	0.34 0.34	mg/Kg wet mg/Kg wet							
Butylbenzylphthalate Carbazole	ND ND	0.34 0.17	mg/Kg wet mg/Kg wet							
Carbazole Chloroaniline	ND ND	0.17	mg/Kg wet mg/Kg wet							V-34
Chloroaniline Chloro-3-methylphenol	ND ND	0.66 0.66	mg/Kg wet mg/Kg wet							+-J *
2-Chloronaphthalene	ND ND	0.66	mg/Kg wet							
2-Chlorophenol	ND ND	0.34	mg/Kg wet							
4-Chlorophenylphenylether	ND ND	0.34	mg/Kg wet							
4-Chrysene Chrysene	ND ND	0.34	mg/Kg wet							
Dibenz(a,h)anthracene	ND ND	0.17	mg/Kg wet							
Dibenzofuran	ND ND	0.34	mg/Kg wet							
Di-n-butylphthalate	ND	0.34	mg/Kg wet							
1,2-Dichlorobenzene	ND	0.34	mg/Kg wet							
1,3-Dichlorobenzene	ND	0.34	mg/Kg wet							
1,4-Dichlorobenzene	ND	0.34	mg/Kg wet							
3,3-Dichlorobenzidine	ND	0.17	mg/Kg wet							
2,4-Dichlorophenol	ND	0.34	mg/Kg wet							
Diethylphthalate	ND	0.34	mg/Kg wet							
2,4-Dimethylphenol	ND	0.34	mg/Kg wet							
Dimethylphthalate	ND	0.34	mg/Kg wet							
4,6-Dinitro-2-methylphenol	ND	0.34	mg/Kg wet							
2,4-Dinitrophenol	ND	0.66	mg/Kg wet							
2,4-Dinitrotoluene	ND	0.34	mg/Kg wei							
2,6-Dinitrotoluene	ND	0.34	mg/Kg wet							
Di-n-octylphthalate	ND	0.34	mg/Kg wet							
1,2-Diphenylhydrazine/Azobenzene	ND	0.34	mg/Kg wet							
Fluoranthene	ND	0.17	mg/Kg wet							
Fluorene	ND	0.17	mg/Kg wet							
Hexachlorobenzene	ND	0.34	mg/Kg wet							
Hexachlorobutadiene	ND	0.34	mg/Kg wet							***=
Hexachlorocyclopentadiene	ND	0.34	mg/Kg wet							V-05
Hexachloroethane	ND	0.34	mg/Kg wet							
deno(1,2,3-cd)pyrene	ND	0.17	mg/Kg wet							
sophorone	ND	0.34	mg/Kg wet							
I-Methylnaphthalene	ND	0.17	mg/Kg wet							
2-Methylnaphthalene	ND	0.17	mg/Kg wet							



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332 QUALITY CONTROL

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B246869 - SW-846 3546										
Blank (B246869-BLK1)				Prepared: 11.	/24/19 Analy	/zed: 11/27/1	9			
2-Methylphenol	ND	0.34	mg/Kg wet							
3/4-Methylphenol	ND	0.34	mg/Kg wet							
Naphthalene	ND	0.17	mg/Kg wet							
2-Nitroaniline	ND	0.34	mg/Kg wet							
3-Nitroaniline	ND	0.34	mg/Kg wet							
4-Nitroaniline	ND	0.34	mg/Kg wet							
Nitrobenzene	ND	0.34	mg/Kg wet							
2-Nitrophenol	ND	0.34	mg/Kg wet							
4-Nitrophenol	ND	0.66	mg/Kg wet							
N-Nitrosodimethylamine	ND	0.34	mg/Kg wet							
N-Nitrosodiphenylamine/Diphenylamine	ND	0.34	mg/Kg wet							
N-Nitrosodi-n-propylamine	ND	0.34	mg/Kg wet							
Pentachloronitrobenzene	ND	0.34	mg/Kg wet							
Pentachlorophenol	ND	0.34	mg/Kg wet							V-05
Phenanthrene	ND	0.17	mg/Kg wet							
Phenol	ND	0.34	mg/Kg wet							
Pyrene	ND	0.17	mg/Kg wet							
Pyridine	ND	0.34	mg/Kg wet							
1,2,4,5-Tetrachlorobenzene	ND	0.34	mg/Kg wet							
2,4-Trichlorobenzene	ND	0.34	mg/Kg wet							
,5-Trichlorophenol	ND	0.34	mg/Kg wet							
2,4,6-Trichlorophenol	ND	0.34	mg/Kg wet							
Surrogate: 2-Fluorophenol	5.51		mg/Kg wet	6.67		82.7	30-130			
Surrogate: Phenol-d6	5.60		mg/Kg wet	6.67		84.1	30-130			
Surrogate: Nitrobenzene-d5	2.58		mg/Kg wet	3.33		77.5	30-130			
Surrogate: 2-Fluorobiphenyl	2.76		mg/Kg wet	3.33		82.9 87.5	30-130 30-130			
Surrogate: 2,4,6-Tribromophenol	5.84 3.14		mg/Kg wet mg/Kg wet	6.67 3.33		87.5 94.3	30-130			
Surrogate: p-Terphenyl-d14	5.14		mg/kg wet	3.33		74.5	30-130			
LCS (B246869-BS1)					/24/19 Analy					
Acenaphthene	1.09	0.17	mg/Kg wet	1.67		65.7	40-140			
Acenaphthylene	1.17	0.17	mg/Kg wet	1.67		70.0	40-140			
Acetophenone	1.11	0.34	mg/Kg wet	1.67		66.6	40-140			
Aniline	0.809	0.34	mg/Kg wet	1.67		48.5	10-140			
Anthracene	1.25	0.17	mg/Kg wet mg/Kg wet	1.67		75.0	40-140 40-140			V-04, V-05, V-3
Benzidine	1.85	0.66		1.67		111				
Benzo(a)anthracene	1.20	0.17 0.17	mg/Kg wet mg/Kg wet	1.67		72.2 70.2	40-140 40-140			
Senzo(a)pyrene	1.17	0.17	mg/Kg wet	1.67 1.67		70.2	40-140			
Benzo(b)fluoranthene Benzo(g,h,i)perylene	1.18	0.17	mg/Kg wet	1.67		68.8	40-140			
senzo(g,n,1)peryiene Senzo(k)fluoranthene	1.15 1.21	0.17	mg/Kg wet	1.67		72.3	40-140			
Benzoic Acid	0.179	1.0	mg/Kg wet	1.67		10.7 *	30-130			L-04
is(2-chloroethoxy)methane	0.179 1.11	0.34	mg/Kg wet	1.67		66.6	40-140			2-04
Bis(2-chloroethyl)ether	1.04	0.34	mg/Kg wet	1.67		62.4	40-140			
Bis(2-chloroisopropyl)ether	1,13	0.34	mg/Kg wet	1.67		67.6	40-140			
lis(2-Ethylhexyl)phthalate	1.13	0.34	mg/Kg wet	1.67		74.2	40-140			
-Bromophenylphenylether	1.24	0.34	mg/Kg wet	1.67		70.3	40-140			
lutylbenzylphthalate	1.17	0.34	mg/Kg wet	1.67		73.6	40-140			
rbazole	1.20	0.17	mg/Kg wet	1.67		72.3	40-140			
Chloroaniline	0.893	0.66	mg/Kg wet	1.67		53.6	10-140			V-34
-Chloro-3-methylphenol	1.23	0.66	mg/Kg wet	1.67		73.7	30-130			



QUALITY CONTROL

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
atch B246869 - SW-846 3546										
.CS (B246869-BS1)				Prepared: 11	/24/19 Analy	yzed: 11/27/1	9			
-Chlorophenol	1.11	0.34	mg/Kg wet	1.67		66.4	30~130			
-Chlorophenylphenylether	1.16	0.34	mg/Kg wet	1.67		69.4	40-140			
hrysene	1.19	0.17	mg/Kg wet	1.67		71.2	40-140			
ibenz(a,h)anthracene	1.14	0.17	mg/Kg wet	1.67		68.5	40-140			
ribenzofuran	1.20	0.34	mg/Kg wet	1.67		71.8	40-140			
i-n-butylphthalate	1.24	0.34	mg/Kg wet	1.67		74.2	40-140			
2-Dichlorobenzene	1.02	0.34	mg/Kg wet	1.67		61.1	40-140			
3-Dichlorobenzene	0.991	0.34	mg/Kg wet	1.67		59.5	40-140			
4-Dichlorobenzene	0.995	0.34	mg/Kg wet	1.67		59.7	40-140			
3-Dichlorobenzidine	0.946	0.17	mg/Kg wet	1.67		56.8	20-140			
4-Dichlorophenol	1.13	0.34	mg/Kg wet	1.67		67.6	30-130			
iethylphthalate	1.16	0.34	mg/Kg wet	1.67		69.8	40-140			
4-Dimethylphenol	1.01	0.34	mg/Kg wet	1.67		60.8	30-130			
imethylphthalate	1.16	0.34	mg/Kg wet	1.67		69.7	40-140			
6-Dinitro-2-methylphenol	1.09	0.34	mg/Kg wet	1.67		65.5	30-130			
4-Dinitrophenol	0.601	0.66	mg/Kg wet	1.67		36.1	30-130			
4-Dinitrotoluene	1.30	0.34	mg/Kg wet	1.67		78.1	40-140			
6-Dinitrotoluene	1.32	0.34	mg/Kg wet	1.67		79.4	40-140			
i-n-octylphthalate	1.29	0.34	mg/Kg wet	1.67		77.4	40-140			
2-Diphenylhydrazine/Azobenzene	1.24	0.34	mg/Kg wet	1.67		74.1	40-140			
oranthene	1.25	0.17	mg/Kg wet	1.67		75.0	40-140			
uorene	1.20	0.17	mg/Kg wet	1.67		71.8	40-140			
exachlorobenzene	1.25	0.34	mg/Kg wet	1.67		75.1	40-140			
exachlorobutadiene	0.990	0.34	mg/Kg wet	1.67		59.4	40-140			
exachlorocyclopentadiene	0.692	0.34	mg/Kg wet	1.67		41.5	40-140			V-05
exachloroethane	1.01	0.34	mg/Kg wet	1.67		60.7	40-140			
deno(1,2,3-cd)pyrene	1.24	0.17	mg/Kg wet	1.67		74.6	40-140			
ophorone	1.16	0.34	mg/Kg wet	1.67		69.8	40-140			
Methylnaphthalene	1.01	0.17	mg/Kg wet	1.67		60.5	40-140			
Methylnaphthalene	1.21	0.17	mg/Kg wet	1.67		72.5	40-140			
Methylphenol	1.08	0.34	mg/Kg wet	1.67		64.9	30-130			
4-Methylphenol	1.15	0.34	mg/Kg wet	1.67		69.1	30-130			
aphthalene	1.09	0.17	mg/Kg wet	1.67		65.3	40-140			
Nitroaniline	1.30	0.34	mg/Kg wet	1.67		77.8	40-140			
Nitroaniline	1.21	0.34	mg/Kg wet	1.67		72.7	30-140			
Nitroaniline	1.33	0.34	mg/Kg wet	1.67		79.6	40-140			
itrobenzene	1.13	0.34	mg/Kg wet	1.67		67.6	40-140			
Nitrophenol	1.26	0.34	mg/Kg wet	1.67		75.9	30-130			
Nitrophenol	1.39	0.66	mg/Kg wet	1.67		83.4	30-130			
-Nitrosodimethylamine	0.944	0.34	mg/Kg wet	1.67		56.7	40-140			
-Nitrosodiphenylamine/Diphenylamine	1.27	0.34	mg/Kg wet	1.67		76.2	40-140			
-Nitrosodi-n-propylamine	1.11	0.34	mg/Kg wet	1.67		66.8	40-140			
entachloronitrobenzene	1.29	0.34	mg/Kg wet	1.67		77.2	40-140			
ntachlorophenol	0.791	0.34	mg/Kg wet	1.67		47.4	30-130			V-05
enanthrene	1,24	0.17	mg/Kg wet	1.67		74.4	40-140			
enol	1.22	0.34	mg/Kg wet	1.67		73.1	30-130			
rene	1.21	0.17	mg/Kg wet	1.67		72.7	40-140			
ridine	0.632	0.34	mg/Kg wet	1.67		37.9	30-140			
2,4,5-Tetrachlorobenzene	1.04	0.34	mg/Kg wet	1.67		62.5	40-140			
2,4-Trichlorobenzene	1.03	0.34	mg/Kg wet	1.67		61.9	40-140			
4,5-Trichlorophenol	1.26	0.34 0.34	mg/Kg wet mg/Kg wet	1.67		75.6	30-130			



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332 QUALITY CONTROL

	. .	Reporting	11-7-	Spike	Source	0/000	%REC	RPD	RPD	Not	
Analyte	Result	Limit	Units	Level	Result	%REC	Limits	KYD	Limit	Notes	L
Batch B246869 - SW-846 3546											
LCS (B246869-BS1)				Prepared: 11	1/24/19 Analy	/zcd: 11/27/1	9				==
Surrogate: 2-Fluorophenol	4.87		mg/Kg wet	6.67		73.1	30-130				
Surrogate: Phenol-d6	5.00		mg/Kg wet	6.67		75.1	30-130				
Surrogate: Nitrobenzene-d5	2.33		mg/Kg wet	3.33		69.9	30-130				
Surrogate: 2-Fluorobiphenyl	2.47		mg/Kg wet	3.33		74.0	30-130				
Surrogate: 2,4,6-Tribromophenol	6.16		mg/Kg wet	6.67		92.4	30-130				
Surrogate: p-Terphenyl-d14	2.80		mg/Kg wet	3.33		83.9	30-130				
LCS Dup (B246869-BSD1)				Prepared: 11	/24/19 Analy	/zed: 11/27/1	9				
Acenaphthene	1.14	0.17	mg/Kg wet	1.67		68.5	40-140	4.26	30		
Acenaphthylene	1.19	0.17	mg/Kg wet	1.67		71.6	40-140	2.26	30		
Acetophenone	1.22	0.34	mg/Kg wet	1.67		73.4	40-140	9.71	30		
Aniline	0.956	0.34	mg/Kg wet	1.67		57.4	10-140	16.7	50		† ‡
Anthracene	1.29	0.17	mg/Kg wet	1.67		77.3	40-140	2.97	30		
Benzidine	1.92	0.66	mg/Kg wet	1.67		115	40-140	4.03	30	V-04, V-05, V-35	
Benzo(a)anthracene	1.24	0.17	mg/Kg wet	1.67		74.3	40-140	2.87	30		
Benzo(a)pyrene	1.21	0.17	mg/Kg wet	1.67		72.6	40-140	3.33	30		
Benzo(b)fluoranthene	1.29	0.17	mg/Kg wet	1.67		77.4	40-140	8.54	30		
Benzo(g,h,i)perylene	1.33	0.17	mg/Kg wet	1.67		79.8	40-140	14.7	30		
Benzo(k)fluoranthene	1.30	0.17	mg/Kg wet	1.67		78.1	40-140	7.69	30		
Benzoic Acid	0.168	1.0	mg/Kg wet	1.67		10.1 *	30-130	6.35	50	L-04	‡
s(2-chloroethoxy)methane	1.20	0.34	mg/Kg wet	1.67		72.3	40-140	8.27	30		
Bis(2-chloroethyl)ether	1.16	0.34	mg/Kg wet	1.67		69.7	40-140	11.2	30		
Bis(2-chloroisopropyl)ether	1.26	0.34	mg/Kg wet	1.67		75.4	40-140	10.9	30		
Bis(2-Ethylhexyl)phthalate	1.25	0.34	mg/Kg wet	1.67		75.2	40-140	1.34	30		
4-Bromophenylphenylether	1.26	0.34	mg/Kg wet	1.67		75.7	40-140	7.37	30		
Butylbenzylphthalate	1.26	0.34	mg/Kg wet	1.67		75.8	40-140	2.86	30		
Carbazole	1.22	0.17	mg/Kg wet	1.67		73.4	40-140	1.59	30		
4-Chloroaniline	0.976	0.66	mg/Kg wet	1.67		58.5	10-140	8.81	30	V-34	†
4-Chloro-3-methylphenol	1.17	0.66	mg/Kg wet	1.67		70.1	30-130	5.01	30		
2-Chloronaphthalene	1.07	0.34	mg/Kg wet	1.67		64.0	40-140	7.79	30		
2-Chlorophenol	1.23	0.34	mg/Kg wet	1.67		73.6	30-130	10.3	30		
4-Chlorophenylphenylether	1.16	0.34	mg/Kg wet	1.67		69.5	40-140	0.0576	30		
Chrysene	1.21	0.17	mg/Kg wet	1.67		72.7	40-140	2.08	30		
Dibenz(a,h)anthracene	1.24	0.17	mg/Kg wet	1.67		74.6	40-140	8.55	30		
Dibenzofuran	1.21	0.34	mg/Kg wet	1.67		72.3	40-140	0.777	30		
Di-n-butylphthalate	1.26	0.34	mg/Kg wet	1.67		75.8	40-140	2.13	30		
1,2-Dichlorobenzene	1.14	0.34	mg/Kg wet	1.67		68.3	40-140	11.1	30		
1,3-Dichlorobenzene	1.10	0.34	mg/Kg wet	1.67		66.0	40-140	10.4	30		
1,4-Dichlorobenzene	1.11	0.34	mg/Kg wet	1.67		66.5	40-140	10.8	30		
3,3-Dichlorobenzidine	1.07	0.17	mg/Kg wet	1.67		64.1	20-140	12.1	50		† ‡
2,4-Dichlorophenol	1.17	0.34	mg/Kg wet	1.67		70.3	30-130	3.92	30		
Diethylphthalate	1.15	0.34	mg/Kg wet	1.67		68.8	40-140	1.36	30		
2,4-Dimethylphenol	1.07	0.34	mg/Kg wet	1.67		63.9	30-130	4.94	30		
Dimethylphthalate	1.19	0.34	mg/Kg wet	1.67		71.4	40-140	2.47	30		
4,6-Dinitro-2-methylphenol	1.09	0,34	mg/Kg wet	1.67		65.5	30-130	0.0916	30		
2,4-Dinitrophenol	0.557	0.66	mg/Kg wet	1.67		33.4	30-130	7.71	30		
2,4-Dinitrotoluene	1.25	0.34	mg/Kg wet	1.67		74.8	40-140	4.34	30		
2,6-Dinitrotoluene	1.33	0.34	mg/Kg wet	1.67		79.9	40-140	0.653	30		
)i-n-octylphthalate	1.54	0.34	mg/Kg wet	1.67		92.4	40-140	17.6	30		
,,2-Diphenylhydrazine/Azobenzene	1.35	0.34	mg/Kg wet	1.67		80.8	40-140	8.63	30		
Fluoranthene	1.27	0.17	mg/Kg wet	1.67		76.4	40-140	1.85	30		
Fluorene	1.17	0.17	mg/Kg wet	1.67		70.4	40-140	1.91	30		



QUALITY CONTROL

		Reporting		Spike	Source		%REC		RPD		
Analyte	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes	
Batch B246869 - SW-846 3546											
LCS Dup (B246869-BSD1)]	Prepared: 11	/24/19 Analy	yzed: 11/27/1	9				
Hexachlorobenzene	1.31	0.34	mg/Kg wet	1.67		78.9	40-140	4.86	30		
Hexachlorobutadiene	1.13	0.34	mg/Kg wet	1.67		67.6	40-140	12.9	30		
Hexachlorocyclopentadiene	0.678	0.34	mg/Kg wet	1.67		40.7	40-140	1.99	30	V-05	
Hexachloroethane	1.11	0.34	mg/Kg wet	1.67		66.4	40-140	8.96	30		
Indeno(1,2,3-cd)pyrene	1.37	0.17	mg/Kg wet	1.67		82.0	40-140	9.48	30		
sophorone	1.24	0.34	mg/Kg wet	1.67		74.7	40-140	6.67	30		
I-Methylnaphthalene	1.05	0.17	mg/Kg wet	1.67		63.0	40-140	4.05	30		
2-Methylnaphthalene	1.27	0.17	mg/Kg wet	1.67		76.0	40-140	4.69	30		
2-Methylphenol	1.17	0.34	mg/Kg wet	1.67		70.1	30-130	7.79	30		
3/4-Methylphenol	1,21	0.34	mg/Kg wet	1.67		72.4	30-130	4.66	30		
Naphthalene	1.19	0.17	mg/Kg wet	1.67		71.4	40-140	8.92	30		
-Nitroaniline	1.28	0.34	mg/Kg wet	1.67		76.7	40-140	1.50	30		
-Nitroaniline	1.20	0.34	mg/Kg wet	1.67		72.3	30-140	0.607	30		
-Nitroaniline	1.23	0.34	mg/Kg wet	1.67		74.1	40-140	7.19	30		
Vitrobenzene	1.24	0.34	mg/Kg wet	1.67		74.1	40-140	9.29	30		
2-Nitrophenol	1.39	0.34	mg/Kg wet	1.67		83.7	30-130	9.75	30		
-Nitrophenol	1.26	0.66	mg/Kg wet	1.67		75.8	30-130	9.53	50		
N-Nitrosodimethylamine	1.04	0.34	mg/Kg wet	1.67		62.4	40-140	9.71	30		
N-Nitrosodiphenylamine/Diphenylamine	1.36	0.34	mg/Kg wet	1.67		81.4	40-140	6.58	30		
N-Nitrosodi-n-propylamine	1.21	0.34	mg/Kg wet	1.67		72.5	40-140	8.15	30		
ntachloronitrobenzene	1.30	0.34	mg/Kg wet	1.67		78.1	40-140	1.16	30		
entachlorophenol	0.770	0.34	mg/Kg wet	1.67		46.2	30-130	2.65	30	V-05	
Phenanthrene	1.27	0.17	mg/Kg wet	1.67		76.2	40-140	2.39	30		
Phenol	1.32	0.34	mg/Kg wet	1.67		79.1	30-130	7.99	30		
Pyrene	1.25	0.17	mg/Kg wet	1.67		75.2	40-140	3.41	30		
Pyridine	0.687	0.34	mg/Kg wet	1.67		41.2	30-140	8.34	30		
,2,4,5-Tetrachlorobenzene	1.20	0.34	mg/Kg wet	1.67		72.2	40-140	14.3	30		
,2,4-Trichlorobenzene	1.16	0.34	mg/Kg wet	1.67		69.6	40-140	11.8	30		
2,4,5-Trichlorophenol	1.29	0.34	mg/Kg wet	1.67		77.3	30-130	2.12	30		
2,4,6-Trichlorophenol	1.24	0.34	mg/Kg wet	1.67		74.2	30-130	5.43	30		
Surrogate: 2-Fluorophenol	5.38		mg/Kg wet	6.67		80.7	30-130				
Surrogate: Phenol-d6	5.28		mg/Kg wet	6.67		79.3	30-130				
Surrogate: Nitrobenzene-d5	2.52		mg/Kg wet	3.33		75.7	30-130				
Surrogate: 2-Fluorobiphenyl	2.68		mg/Kg wet	3.33		80.6	30-130				
Surrogate: 2,4,6-Tribromophenol	5.69		mg/Kg wet	6.67		85.4	30-130				
Surrogate: p-Terphenyl-d14	2.84		mg/Kg wet	3.33		85.1	30-130				



39 Spruce Street * East Longmeadow, MA 01028 * FAX 413/525-6405 * TEL. 413/525-2332 QUALITY CONTROL

Metals Analyses (Total) - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B247114 - SW-846 7471										
Blank (B247114-BLK1)				Prepared: 1	1/26/19 Analy	zed: 11/27/	19			
Mercury	ND	0.025	mg/Kg wet			· · · · · · · · · · · · · · · · · · ·				
LCS (B247114-BS1)				Prepared: 1	1/26/19 Analy	zed: 11/27/	19			
Mercury	2.73	0.38	mg/Kg wet	2.93		93.1	71.3-128.7			
LCS Dup (B247114-BSD1)				Prepared: 1	1/26/19 Analy	/zcd: 11/27/	19			
Мегсигу	2.23	0.38	mg/Kg wet	2.93		76.0	71.3-128.7	20.2	20	R-05
Batch B247118 - SW-846 3050B										
				Prepared: 1:	1/26/19 Analy	zed: 11/27/	19			
Blank (B247118-BLK1) Antimony	ND	1.7	mg/Kg wet	ricpared; I	ZUIT Analy	zcu. 11/2//				
Arsenic	ND ND	1.7	mg/Kg wet							
Barium	ND ND	1.7	mg/Kg wet							
Beryllium	ND	0.17	mg/Kg wet							
Cadmium	ND ND	0.17	mg/Kg wet							
Chromium	ND ND	0.33	mg/Kg wet							
.ead	ND ND	0.50	mg/Kg wet							
lickel	ND ND	0.33	mg/Kg wet							
elenium		3.3	mg/Kg wet							
elenium ilver	ND	0.33	mg/Kg wet							
lallium	ND	1.7	mg/Kg wet							
	ND	0.67	mg/Kg wet							
'anadium inc	ND	0.67	mg/Kg wet							
linc	ND	0.07	mg/ng wet							
.CS (B247118-BS1)				·····	1/26/19 Analy					
antimony	29.7	5.0	mg/Kg wet	40.0		74.2	6.3-208			
rsenic	108	5.0	mg/Kg wet	125		86.5	82.4-116.8			
arium	539	5.0	mg/Kg wet	529		102	81.7-118.5			
eryllium	147	0.50	mg/Kg wet	155		94.8	82.6-116.8			
admium	37.6	0.50	mg/Kg wet	37.7		99.7	82.2-117.5			
hromium	51.4	0.99	mg/Kg wet	58.3		88.1	82-118.2			
ead	94.9	1.5	mg/Kg wet	111		85.5	82.3-117.1			
fickel	311	0.99	mg/Kg wet	333		93.5	82.6-117.4			
elenium	226	9.9	mg/Kg wet	251		89.9	78.9-121.5			
ilver	26.5	0.99	mg/Kg wet	27.2		97.6	81-119.2			
hallium	221	5.0	mg/Kg wet	241		91.5	80.5-119.1			
anadium (anadium	108	2.0	mg/Kg wet	125		86.7	78.6-120.8			
ine	325	2.0	mg/Kg wet	351		92.5	80.3-119.4			
CS Dup (B247118-BSD1)				Prepared: 1	1/26/19 Analy	zed: 11/27/	19			
ntimony	29.6	4.9	mg/Kg wet	40.0		73.9	6.3-208	0.448	30	
rsenic	109	4.9	mg/Kg wet	125		86.8	82.4-116.8	0.361	30	
arium	583	4.9	mg/Kg wet	529		110	81.7-118.5	7.84	20	
eryllium	145	0.49	mg/Kg wet	155		93.4	82.6-116.8	1.50	30	
admium	35.9	0.49	mg/Kg wet	37.7		95.2	82.2-117.5	4.66	20	
hromium	51.9	0.98	mg/Kg wet	58.3		89.0	82-118.2	0.978	30	
ead	96.4	1.5	mg/Kg wet	111		86.9	82.3-117.1	1.59	30	
ickel	316	0.98	mg/Kg wet	333		94.9	82.6-117.4	1.52	30	
elenium	225	9.8	mg/Kg wet	251		89.6	78.9-121.5	0.276	30	
lver	27.1	0.98	mg/Kg wet	27.2		99.7	81-119.2	2.19	30	
hallium	220	4.9	mg/Kg wet	241		91.2	80.5-119.1	0.306	30	
anadium	109	2.0	mg/Kg wet	125		87.0	78.6-120.8	0.292	30	
inc	321	2.0	mg/Kg wet	351		91.5	80.3-119.4	1.12	30	

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QUALITY CONTROL

Metals Analyses (Total) - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Analyte	Kesun	Limit	Onns	Devel	Result	70102.0	Linns	NG D	Limit	140103
Batch B247118 - SW-846 3050B										
Duplicate (B247118-DUP1)	Sour	ce: 19K1404	-01	Prepared: 11	/26/19 Analyz	ed: 11/27/	19			
Antimony	ND	3.0	mg/Kg dry		ND			NC	35	
Arsenic	5.95	3.0	mg/Kg dry		8.14			31.0	35	
Barium	63.2	3.0	mg/Kg dry		63.7			0.781	35	
Beryllium	0.483	0.30	mg/Kg dry		0.493			2.13	35	
Cadmium	0.314	0.30	mg/Kg dry		ND			NC	35	
Chromium	14.5	0.60	mg/Kg dry		13.8			4.91	35	
cad	90.7	0.90	mg/Kg dry		86.6			4.71	35	
Nickel	10.5	0.60	mg/Kg dry		9.84			6.58	35	
elenium	ND	6.0	mg/Kg dry		ND			NC	35	
lilver	ND	0.60	mg/Kg dry		ND			NC	35	
`hallium	ND	3.0	mg/Kg dry		ND			NC	35	
/anadium	34.6	1.2	mg/Kg dry		37.0			6.79	35	
Zinc	68.6	1.2	mg/Kg dry		69.7			1.48	35	
MRL Check (B247118-MRL1)				Prepared: 11	/26/19 Analyz	ed: 11/27/	19			
ead	0.520	0.50	mg/Kg wet	0.500		104	80-120			
Matrix Spike (B247118-MS1)	Sour	ce: 19K1404	-01	Prepared: 11	/26/19 Analyz	ed: 11/27/	19			
Antimony	10.6	2.9	mg/Kg dry	28.9	1.61	31.1 *	75-125			MS-07
Arsenic	30.8	2.9	mg/Kg dry	28.9	8.14	78.3	75-125			
ırium	94.7	2.9	mg/Kg dry	28.9	63.7	108	75-125			
seryllium	27.3	0.29	mg/Kg dry	28.9	0.493	92.8	75-125			
Cadmium	25.9	0.29	mg/Kg dry	28.9	0.295	88.7	75-125			
Chromium	42.0	0.58	mg/Kg dry	28.9	13.8	97.8	75-125			
.ead	117	0.87	mg/Kg dry	28.9	86.6	107	75-125			
lickel	36.7	0.58	mg/Kg dry	28.9	9.84	93.1	75-125			
elenium	25.1	5.8	mg/Kg dry	28.9	ND	86.9	75-125			
filver	29.2	0.58	mg/Kg dry	28.9	ND	101	75-125			
hallium	31.3	2.9	mg/Kg dry	28.9	ND	108	75-125			
/anadium	62.9	1.2	mg/Kg dry	28.9	37.0	89.6	75-125			
inc	126	1.2	mg/Kg dry	57.8	69.7	97.4	75-125			



FLAG/QUALIFIER SUMMARY

*	QC result is outside of established limits.
†	Wide recovery limits established for difficult compound.
‡	Wide RPD limits established for difficult compound.
#	Data exceeded client recommended or regulatory level
ND	Not Detected
RL	Reporting Limit is at the level of quantitation (LOQ)
DL	Detection Limit is the lower limit of detection determined by the MDL study
MCL	Maximum Contaminant Level
	Percent recoveries and relative percent differences (RPDs) are determined by the software using values in the calculation which have not been rounded.
	No results have been blank subtracted unless specified in the case narrative section.
L-04	Laboratory fortified blank/laboratory control sample recovery and duplicate recovery are outside of control limits. Reported value for this compound is likely to be biased on the low side.
MS-07	Matrix spike recovery is outside of control limits. Analysis is in control based on laboratory fortified blank recovery. Possibility of sample matrix effects that lead to low bias for reported result or non-homogeneous sample aliquot cannot be eliminated.
R-05	Laboratory fortified blank duplicate RPD is outside of control limits. Reduced precision is anticipated for any reported value for this compound.
V-04	Initial calibration did not meet method specifications. Compound was calibrated using a response factor where %RSD is outside of method specified criteria. Reported result is estimated.
V-05	Continuing calibration verification (CCV) did not meet method specifications and was biased on the low side for this compound.
V-20	Continuing calibration verification (CCV) did not meet method specifications and was biased on the high side. Data validation is not affected since sample result was "not detected" for this compound.
V-34	Initial calibration verification (ICV) did not meet method specifications and was biased on the low side for this compound. Reported result is estimated.
V-35	Initial calibration verification (ICV) did not meet method specifications and was biased on the high side for this compound. Reported result is estimated.



CERTIFICATIONS

rtified Analyses included in this Report

Analyses included in this Report	Certifications	
Analyte	Cei illicativits	
SW-846 6010D in Soil		
Antimony	CT,NH,NY,ME,VA,NC	
Arsenic	CT,NH,NY,ME,VA,NC	
Barium	CT,NH,NY,ME,VA,NC	
Beryllium	CT,NH,NY,ME,VA,NC	
Cadmium	CT,NH,NY,ME,VA,NC	
Chromium	CT,NH,NY,ME,VA,NC	
Lead	CT,NH,NY,AIHA,ME,VA,NC	
Nickel	CT,NH,NY,ME,VA,NC	
Selenium	CT,NH,NY,ME,VA,NC	
Silver	CT,NH,NY,ME,VA,NC	
Thallium	CT,NH,NY,ME,VA,NC	
Vanadium	CT,NH,NY,ME,VA,NC	
Zinc	CT,NH,NY,ME,VA,NC	
SW-846 7471B in Soil		
Mercury	CT,NH,NY,NC,ME,VA	
SW-846 8270D-E in Soil		
Acenaphthene	CT,NY,NH,ME,NC,VA	
Acenaphthylene	CT,NY,NH,ME,NC,VA	
Acetophenone	NY,NH,ME,NC,VA	
Aniline	NY,NH,ME,NC,VA	
Anthracene	CT,NY,NH,ME,NC,VA	
Benzidine	CT,NY,NH,ME,NC,VA	
Benzo(a)anthracene	CT,NY,NH,ME,NC,VA	
Benzo(a)pyrene	CT,NY,NH,ME,NC,VA	
Benzo(b)fluoranthene	CT,NY,NH,ME,NC,VA	
Benzo(g,h,i)perylene	CT,NY,NH,ME,NC,VA	
Benzo(k)fluoranthene	CT,NY,NH,ME,NC,VA	
Benzoic Acid	NY,NH,ME,NC,VA	
Bis(2-chloroethoxy)methane	CT,NY,NH,ME,NC,VA	
Bis(2-chloroethyl)ether	CT,NY,NH,ME,NC,VA	
Bis(2-chloroisopropyl)ether	CT,NY,NH,ME,NC,VA	
Bis(2-Ethylhexyl)phthalate	CT,NY,NH,ME,NC,VA	
4-Bromophenylphenylether	CT,NY,NH,ME,NC,VA	
Butylbenzylphthalate	CT,NY,NH,ME,NC,VA	
Carbazole	NC	
4-Chloroaniline	CT,NY,NH,ME,NC,VA	
4-Chloro-3-methylphenol	CT,NY,NH,ME,NC,VA	
2-Chloronaphthalene	CT,NY,NH,NC,VA	
2-Chlorophenol	CT,NY,NH,ME,NC,VA	
4-Chlorophenylphenylether	CT,NY,NH,ME,NC,VA	
Chrysene	CT,NY,NH,ME,NC,VA	
Dibenz(a,h)anthracene	CT,NY,NH,ME,NC,VA	
Dibenzofuran	CT,NY,NH,ME,NC,VA	
Di-n-butylphthalate	CT,NY,NH,ME,NC,VA	
1,2-Dichlorobenzene	NY,NH,ME,NC,VA	
1,3-Dichlorobenzene	NY,NH,ME,NC,VA	



CERTIFICATIONS

ertified Analyses included in this Report

Analyte	Certifications
SW-846 8270D-E in Soil	
1,4-Dichlorobenzene	NY,NH,ME,NC,VA
3,3-Dichlorobenzidine	CT,NY,NH,ME,NC,VA
2,4-Dichlorophenol	CT,NY,NH,ME,NC,VA
Diethylphthalate	CT,NY,NH,ME,NC,VA
2,4-Dimethylphenol	CT,NY,NH,ME,NC,VA
Dimethylphthalate	CT,NY,NH,ME,NC,VA
4,6-Dinitro-2-methylphenol	CT,NY,NH,ME,NC,VA
2,4-Dinitrophenol	CT,NY,NH,ME,NC,VA
2,4-Dinitrotoluenc	CT,NY,NH,ME,NC,VA
2,6-Dinitrotoluene	CT,NY,NH,ME,NC,VA
Di-n-octylphthalate	CT,NY,NH,ME,NC,VA
1,2-Diphenylhydrazine/Azobenzene	NY,NH,ME,NC,VA
Fluoranthene	CT,NY,NH,ME,NC,VA
Fluorene	NY,NH,ME,NC,VA
Hexachlorobenzene	CT,NY,NH,ME,NC,VA
Hexachlorobutadiene	CT,NY,NH,ME,NC,VA
Hexachlorocyclopentadiene	CT,NY,NH,ME,NC,VA
Hexachloroethane	CT,NY,NH,ME,NC,VA
Indeno(1,2,3-cd)pyrene	CT,NY,NH,ME,NC,VA
Isophorone	CT,NY,NH,ME,NC,VA
I-Methylnaphthalene	NC
2-Methylnaphthalene	CT,NY,NH,ME,NC,VA
2-Methylphenol	CT,NY,NH,ME,NC,VA
3/4-Methylphenol	CT,NY,NH,ME,NC,VA
Naphthalene	CT,NY,NH,ME,NC,VA
2-Nitroaniline	CT,NY,NH,ME,NC,VA
3-Nitroaniline	CT,NY,NH,ME,NC,VA
4-Nitroaniline	CT,NY,NH,ME,NC,VA
Nitrobenzene	CT,NY,NH,ME,NC,VA
2-Nitrophenol	CT,NY,NH,ME,NC,VA
4-Nitrophenol	CT,NY,NH,ME,NC,VA
N-Nitrosodimethylamine	CT,NY,NH,ME,NC,VA
N-Nitrosodi-n-propylamine	CT,NY,NH,ME,NC,VA
Pentachloronitrobenzene	NY,NC
Pentachlorophenol	CT,NY,NH,ME,NC,VA
Phenanthrene	CT,NY,NH,ME,NC,VA
Phenol	CT,NY,NH,ME,NC,VA
Pyrene	CT,NY,NH,ME,NC,VA
Pyridine	CT,NY,NH,ME,NC,VA
1,2,4,5-Tetrachlorobenzene	NY,NC
1,2,4-Trichlorobenzene	CT,NY,NH,ME,NC,VA
2,4,5-Trichlorophenol	CT,NY,NH,ME,NC,VA
2,4,6-Trichlorophenol	CT,NY,NH,ME,NC,VA
2-Fluorophenol	NC



The CON-TEST Environmental Laboratory operates under the following certifications and accreditations:

Code	Description	Number	Expires	
AIHA	AIHA-LAP, LLC - ISO17025:2017	100033	03/1/2022	
MA	Massachusetts DEP	M-MA100	06/30/2020	
CT	Connecticut Department of Publile Health	PH-0567	09/30/2021	
NY	New York State Department of Health	10899 NELAP	04/1/2020	
NH-S	New Hampshire Environmental Lab	2516 NELAP	02/5/2020	
RI	Rhode Island Department of Health	LAO00112	12/30/2019	
NC	North Carolina Div. of Water Quality	652	12/31/2019	
NJ	New Jersey DEP	MA007 NELAP	06/30/2020	
FL	Florida Department of Health	E871027 NELAP	06/30/2020	
VT	Vermont Department of Health Lead Laboratory	LL015036	07/30/2020	
МЕ	State of Maine	2011028	06/9/2021	
VA	Commonwealth of Virginia	460217	12/14/2019	
NH-P	New Hampshire Environmental Lab	2557 NELAP	09/6/2020	
VT-DW	Vermont Department of Health Drinking Water	VT-255716	06/12/2020	
NC-DW	North Carolina Department of Health	25703	07/31/2020	
PA	Commonwealth of Pennsylvania DEP	68-05812	06/30/2020	

POL1701

Table of Contents Glassware in freezer? Y / N Prepackaged Cooler? Y / N missing samples from prepacked 'Contest is not responsible for Glassware in the fridge? analyses the laboratory will perform. Any missing information is not the laboratory's responsibility. Cor rest values your partnership on each project and will try to assist with missing information, but will not t Disclaimer: Con-Jest Labs is not responsible for any omitted information on the Chain of Custody. The Chain of Custody is a legal document that must be complete and accurate and is used to determine wha WW = Waste Water DW = Drinking Water Total Number Of: Preservation Codes: Matrix Codes: GW = Ground Water X = Sodium Hydroxide Courier Use Only S = Sulfuric Acid B = Sodium Bisulfate 0 = Other (please O = Other (please define) Non Soxhlet PCB ONLY z } coolers SL = Sludge SOL = Solid Preservation Code Soxhlet GLASS N = Nitric Acid VIALS BACTERIA M = Methanol ENCORE .× Sodium PLASTIC Thiosulfate A = Air S = Soil define) possible sample concentration within the Conc H - High; M - Medium; L - Low; C - Clean; U -Please use the following codes to indicate Chromatogram Code column above: held accountable. ANALYSIS REQUESTED Unknown Other Doc # 381 Rev 2_06262019 0228 7915 RCP Certification Form Required MCP Certification Form Required MA MCP Required CT RCP Required WRTA MA State DW Required 5741AW h1 dow East Longmeadow, MA 01028 ENCORE Dissolved Metals Samples BACTERÍA 39 Spruce Street ASUNDONIST @ CONCONSULTANTS, COM Orthophosphate Sar Fleld Filtered Field Filtered Lab to Filter Lab to Filter MOBRIEN & CONCONSULTANTS, USA PLASTIC BeTH School MBTA GLASS CHAIN OF CUSTODY RECORD VIALS X 0 0 00 Data Delivery. 2 http://www.contestlabs.com ఠ Municipality ound Time Due Date: Brownfield Required 10-Day # QISMd 3.Day 4-Day 4 21 J Rush-Approval CLP Like Data Pkg Required; COMP Detection Limit Requirements PFAS 10-Day (std) 142.0A Government 1430 0830 00,50 Email To: 020 1300 1400 320 130 1236 ax To #: 58 Format Federal Other: -Day Day lient Comments: City Project Entity 11.20.19 11.77.19 16 Other CON CANBUTANT IN Project Location: BEAVER ST WALTHAM MA IN THE OBOTEN LIVE NATICK MA WMASS WALTHAM nail: info@contestlabs.con Date/Tipe/B Phone: 413-525-2332 Date/Time:) Fax: 413-525-6405 11.22.19 Date/Time: Date/Time: Jate/Time: Jate/Time: Date/Time: Date/Time: ALAN SUNDEVIST 91-8H 46-26 HB-26 HB-23 #8-22 48-20 42-84 #8-19 HB-Sampled By: ALAN SVISOQUIST 18301 Con-Test Quote Name/Number: Address: 6 HURON CON-LEST (elinquished by: (signature) STORY OF THE PROPERTY OF THE P Con Test Work Order# 90 7 S 50 $\mathcal{E}_{\mathcal{E}}$ Received by: (signature) eceived by: (signature) 6 G Project Number: Project Manager: Invoice Recipient: Phone: Page 60 of 61

I Have Not Confirmed Sample Container
Numbers With Lab Staff Before Relinquishing
Over Samples_____



Doc# 277 Rev 5 2017

Login	Sample Re	ceipt Checklist -	(Rejection (riteria Lisi	ing - U		ce Policy) A		
Login Sample Receipt Checklist - (Rejection Criteria Listing - Using Acceptance Policy) Any False Statement will be brought to the attention of the Client - State True or False									
Client	CDW (onsolvant	S			•			
Receiv	ed By		SA	Date	11	22	Time	1600	
How were th	e samples	In Cooler	T	No Cooler		On Ice	T	No Ice	
received?		Direct from Samp	olina			Ambient		Melted Ice	
			By Gun #	-5		Actual Tem	p-2.1		
Were samp		-+-	By Blank #						-
Temperatu		nol Intact?	NA	# Actual Temp					-
	Custody Se COC Relin		707			Agree With Sa			_
		eaking/loose caps	on any sam	•	, Chair	Agree Willi ou	p.00.		-
Is COC in in			on any sam		noles re	 ceived within h	oldina time?	T	
Did COC in	_	Client	· T	Analysis	T		er Name	+	_
pertinent Inf		Project	-	ID's	+	Collection	Dates/Times	3 <u>T</u>	_
•		out and legible?	T	•					
Are there La			T.	•	Who	was notified?			_
Are there Ru			F	•	Who	was notified?			_
Are there Sh			F	•	Who	was notified?			
ls there enou	igh Volume	?	T						
		ere applicable?	N H		MS/MS				
Proper Media	a/Container	s Used?	-SA			ng samples rec	quired?	<u>+</u>	-
/ere trip bla	nks receive	ed?	<u>Ė</u>	•		C? <u></u> E	•	110	
Do all sample	es have the	proper pH?		Acid _	IVA		Base	<u>NA</u>	-
								<u> </u>	
Unp-		1 Liter Amb.		1 Liter				z Amb.	10
HCL-		500 mL Amb.	Í	500 mL				nb/Clear	ļ
Meoh-		250 mL Amb.		250 mL				mb/Clear	ļ
Bisulfate-		Flashpoint		Col./Ba				nb/Clear icore	
DI-		Other Glass		Other I Plastic			Frozen:	icore	1
Thiosulfate-		SOC Kit Perchlorate		Ziple					
Sulfuric-		Felchiorate	to the community of the		经基础的程度				
		d Liter Arch	58 24 4 2 E	1 Liter	Plactic		16 0	z Amb.	
Unp-		1 Liter Amb.	a rabbeca	500 mL		_		nb/Clear	Company of the Company
HCL-		500 mL Amb. 250 mL Amb.		250 mL				nb/Clear	
Meoh- Bisulfate-		Col./Bacteria		Flash			1	nb/Clear	
DI-		Other Plastic		Other				соге	
Thiosulfate-		SOC Kit		Plastic			Frozen:		
Sulfuric-		Perchlorate		Ziple					
Comments:									